



PennState
Behrend

Penn State Behrend Faculty Research Handbook

Spring 2018

This handbook can be found at
behrend.psu.edu/researchhandbook

PREFACE

The handbook assists Penn State Behrend faculty members in pursuing sponsored research.

The quest for sponsored research can be complex, time consuming, and frustrating. It can also be rewarding if you are successful.

Many benefits can be accrued to faculty members for successful grant development:

- Additional travel money
- Specialized materials and supplies
- Specialized equipment
- Student assistance
- Additional clerical assistance
- Summer salary
- Support for collaboration or use of consultants
- Support for additional services; e.g., media services, artwork, computing, etc.
- Enhanced national and international recognition through increased participation at meetings
- The ability to conduct higher-level research through the use of more sophisticated equipment, additional travel funds, etc.
- Increased academic contacts outside of the college

Grant writing represents a process through which faculty members can achieve and develop in ways that would otherwise be unavailable to them at the college.

If you have questions please contact Patty Lanich in the Contracts and Grants Management Office (CGMO) at 814-898-7596 or pal16@psu.edu.

Ivor T. Knight, Ph.D.
Associate Dean for Research and Graduate Studies

OVERVIEW

This handbook will promote and facilitate sponsored research among the college's faculty. This includes internal and external sources.

The handbook includes information on the following topics:

- **College Statement on Research and External Funding**
Expectations for the pursuit of external funding.
- **Procedures for Initiating Sponsored Research**
Guidance concerning the process for initiating sponsored research, including a step by-step description.
- **Research Administration, Policy, and Proposal Logistics**
Information concerning proposal routing procedures, research protocol, and research policies.
- **College Research Support and Internal Grants**
The college provides support for research and assists faculty members in applying for internal grants, which may provide seed money to pursue larger external grants.
- **Other Research Protocols**
Other procedures and policies: confidentiality and intellectual property issues, use of human subjects, and private consulting.

STATEMENT ON RESEARCH AND EXTERNAL FUNDING

Mission

The mission of Penn State Behrend as part of the University includes teaching, research, scholarship, and outreach. Our primary objective continues to be to provide excellent education, but we must also focus on research productivity and increasing research funding. External funding provides significant benefits to the faculty and to the college.

Benefits to Faculty

- Independence to pursue scholarship and research
- Salaries to pursue scholarship and research in the summer
- Opportunities for scholarly travel
- Opportunities to employ students in research
- Ability to purchase state-of-the-art equipment beyond the college's capacity
- Prestige and evidence of significant impact and importance in the researcher's field

Benefits to the College

- Demonstrates that Penn State Behrend is fulfilling its mission in research and scholarship
- Strengthens programs and facilities with income independent of University funding
- Quantitative evidence of the excellence and competitiveness of Penn State Behrend faculty members and programs

Expectation

The college recognizes that funding opportunities and procedures vary widely among the disciplines. However, the college expects, and strongly encourages, faculty members will actively seek external funding for research, scholarship, educational enhancement, or equipment.

The annual Faculty Activity Report (FAR) should include recognition of success in funding, as well as recognition of efforts to obtain it even when those efforts did not meet with success. The latter point is particularly important. The funding climate is difficult and competitive, and sponsors only fund a fraction of submitted proposals. Each school will determine how much weight will be granted in the FAR for efforts to obtain external funding.

Assistance

The research staff in your department office, the Chancellor's Office and the school directors can assist faculty members in determining if and where there is government, corporate, or private funding for research in their fields. The link to **SciVal (an online research support link www.funding.scival.com)**, can search particular research topics and also subject interested faculty within the Penn State University as well as outside universities. Funding sources, protocols, compliance issues can all be located at <https://www.research.psu.edu/osp>. Other sources of information include colleagues in the field; acknowledgments in papers, reports, or meetings; and direct contact with agencies. Faculty and staff members can also consider resubmitting unfunded proposals with changes suggested by the reviews, or when the funding priorities in an agency change. Faculty members should also consider team efforts with colleagues at Penn State Behrend, other Penn State locations, and other institutions for larger-scale funding efforts.

The United States Congress is strongly pressuring funding agencies such as NIH, NASA, and

NSF to do more to support and strengthen undergraduate education. Many agencies have established new programs in the last few years. Private companies and foundations also perceive the need to support education. This climate provides opportunities for predominantly undergraduate institutions like Penn State Behrend.

PROCEDURES FOR INITIATING SPONSORED RESEARCH

This section outlines a process for faculty members to initiate sponsored research. Please consult early in the process with the Contracts and Grants Management Office.

- Faculty member has formulated an area of research interest and may have a vague idea of potential sponsors. Prior to contacting college or sponsor staff, the faculty member should answer the following questions:
 - ✓ What is the need or problem?
 - ✓ What is the state-of-the-art, or how does this problem rank in importance in the field?
 - ✓ Why is this project urgent or necessary?
 - ✓ What is the proposed plan of action?
 - ✓ What kinds of resources are needed to carry out this project?

- Faculty member identifies potential funding sources via an electronic search on the Web; e.g., (<http://grants.psu.edu>) or <http://www.research.psu.edu/osp/find-funding/funding-searches> and other sources.

- Faculty member works with the Departmental Research Administrators in their department and informs the Contracts and Grants Management Office their intent to pursue sponsored funding. This should be done as soon as possible so that CGMO can plan calendar such that the proposal is submitted by the sponsor's deadline. Refer to page 5 for the Sponsored Research Checklist

SPONSORED RESEARCH CHECKLIST

- 1. **See Principal Investigator's Checklist on page 6.**
- 2. After review within the school, **submit proposal, statement of work, and budget to the Contracts and Grants Management Office (CGMO) and work with** research staff associate or **Patty Lanich to prepare ePIAF** (electronic internal transmittal form created in SIMS/PSU research system) at least one week prior to proposal deadline. CGMO will review the proposal and, if necessary, request modification of the proposal documents.
- 3. **CGMO will receive and submit the proposal** to sponsor. A copy of the submission is sent to OSP for research system filing and tracking (SIMS) and includes the MyResearch Portal for investigators review.
- 4. OSP and/or principal investigator receive notice from sponsor that **proposal is funded or not funded**. (Sometimes that information goes directly to the principal investigator. Please let CGMO know if a project has or has not been funded.)
- 5. If successful, **OSP staff conducts award negotiations with sponsor**. If OSP staff has any questions they will be forwarded to CGMO for clarification. *NOTE: Only OSP staff is authorized to negotiate AND approve award documentation.* FACULTY MEMBER MUST NOT SIGN ANY CONTRACTS OR AGREEMENTS.
- 6. **Execution of contract or other formal documents** between Penn State and sponsor. *NOTE: Only OSP staff is authorized to execute award contract documents. There is a financial risk to the university if work is started prior to award full execution.*
- 7. **If required, initiate Subagreement Request** to CGMO. Information will be verified and forwarded to OSP for issuance of subagreement to subcontractors.
- 8. College financial officer (FO), in conjunction with the school and/or CGMO **requests restricted account** (budget and fund number) to be added to IBIS via *Add University Restricted Account* (AURA) form.
- 9. When restricted account is approved, same group from #8 use a *Budget Amendment for Restricted Accounts* (BARA) form to **establish an operating budget** for the project.
- 10. Principal investigator **follow guidelines in contract** with sponsor:
 - Timely reports
 - Determine invoicing procedures
 - Adhere to start and end dates
 - Technical reporting requirements as specified in the contract terms and conditions
 - Request no-cost extension through CMGO if necessary following the timing and requirements of the award agreement.
 - All post award information, active protocols, conflict of interest disclosures can be found on www.MyResearch.psu.edu portal for individual up to date information regarding abstracts, pending proposals, active awards, financial accounts, protocols, and conflict of interest disclosures, etc.
- 11. When project is complete, budget office at UP **requests that budget be closed**. The decision to close the budget is done in conjunction with principal investigator, school research staff, college FO, and CGMO.

PRINCIPAL INVESTIGATOR'S CHECKLIST

Things to provide the Contracts and Grants Management Office (CGMO) for proposal submission (allowing two weeks for administrative processing)

- My name, department, and e-mail address
- Name of funding agency and address
- Deadline for proposal submission
- Request for Proposal (RFP) or proposal guidelines and funder/sponsor Web site URL
- What type of project? RESEARCH - INSTRUCTION - OUTREACH
- Identify appropriate format and determine submission protocol – electronic, paper, or both; letters of intent, preliminary proposals, and deadlines
- Project budget, matching funds, and resource issues discussed with school director and CGMO
- Proposal title
- Dollar amount of proposal
- Period of performance
- Preliminary budget
 - ___ Appointment type for investigators – 9 or 12 month, staff, fixed-term, etc.
 - ___ Preliminary budget notes
 - ___ If matching is required, an e-mail or note from unit or school stating matching commitment
- Statement of Work
- Any correspondence with funder/sponsor
- Provide budget and fund number to be charged by Office of Sponsored Programs for transmittal of proposal to sponsor/funder via UPS
- All proposals must go through the electronic approval process with the CGMO office finalizing and submitting the eIAF to the Office of Sponsored Programs to be logged in at OSP one week prior to sponsor submission deadline.** Contact CGMO to begin the administrative processing (or if you need any assistance during the process). Estimation for the above process may take approximately two weeks.

Questions to ask funder/sponsor if no RFP (Request For Proposal) or guidelines are available

- What are your funding policies?
- What is your prime source of funding, e.g., federal, state, foundation, non-profit, industrial?
- Indirect cost allowance – if requesting a reduced rate, Susan Wiedemer's (Associate Controller) approval on waiver document/letter is necessary prior to submission
- Any fringe rate restrictions?
- Maximum amount being awarded per proposal and CAPs or limits on specific category spending?
- How much detail is required for budget?
- Is cost sharing required? (Do not show cost sharing if not required.)

General rules for proposal when guidelines are not provided

- Cover page
 - ___ Name and address of funder/sponsor
 - ___ Title of proposal
 - ___ Principal investigator's name
 - ___ Principal investigator's title
 - ___ Submitting department, unit, or campus
 - ___ Period of performance
 - ___ Space for Penn State approval signatures
- Page numbers
- Table of contents
- An abstract
- Proposal text – a clear statement of the project goals and objectives and a description of the proposed work, benefits to sponsor, external budget, and budget justification
- References, if necessary
- Bibliography

RESEARCH ADMINISTRATION, POLICY, AND PROPOSAL LOGISTICS

Also refer to *Proposal Preparation Guides* (<http://www.research.psu.edu/osp/prepare-proposals/>)

Logistics

- An Electronic Proposal Internal Approval Form (ePIAF) must be completed for each proposal.
- University fiscal year extends from July 1 to June 30
- Annual Salary adjustment (2.5%) is now made July 1 of each year
- The University Federal Identification Number is 24-6000376
- NIH Employer ID Number: 1246000376A1
- The NSF Institutional Code for awarding institution is University Park is 0033290000 - Behrend can be used for project location..
- NSF DUNS Number: 00 340 3953
- SIC: 8221
- ONR Facility Code: N62880
- PA Department of Education: 4-10-14-720-1 (*Administrative Unit Number*)
- NASA CAGE CODE: 7A720
- NAICS CODE: 611310
- FICE: 006965
- Sap Vendor # 141597-216
- Contractor Establishment Code: 003403953 (DUNS Number)
- Legislative Districts: **Erie** – PA Senate (49), PA Congress (1 & 4), U.S. Congress (PA-003); **University Park** – PA Senate (34), PA Congress (171), U.S. Congress (PA-005)
- University sign off for all proposal submissions is John W. Hanold, Associate VP Research
- The address for OSP is 110 Technology Center Building, University Park, PA 16802-7000
- Date of last indirect cost agreement – June 6, 2017 (Provisional for 2017-2018 FY)
- DHHS assurances – August 18, 1994

Definitions

- **Direct Costs:** Typical direct budgetary costs include those for salaries, fringe benefits, small equipment purchases, assistantships, computer time, machine shop time, materials, publication costs, travel, etc. Current inflation rates for subsequent years are 3.5 percent for tuition and 2.5 percent for all other categories.
- **Fringe Benefits:** These are expenses directly associated with employment and are applicable to salaries (category I), graduate assistants (category II), wages (category III), and students (=> 6 credits fall/spring or 4 credits summer - category IV), post doc (Category V).
- **Indirect Costs (F&A):** Indirect costs are based on Modified Total Direct Costs (MTDC) that are calculated as total direct costs less graduate assistant tuition; subcontracts over \$25,000 (regardless of period); equipment (life > 2 years and cost > \$5,000); plant construction; and building amortization. Rates are different for on-campus and off-campus research and instruction. Check with department research staff or CGMO for appropriate rates.
- **Budget Notes:** These notes must accompany each budget. Examples of notes appear below:
 - ✓ **Recovery of Fringe Benefits**
Fringe benefits are computed using the fixed rates of 41.60% applicable to Category I Salaries, 15.40% applicable to Category II Graduate Assistants, 7.90% applicable to Category III Salaries and Wages, 0.10% applicable to Category IV Student Wages, and 26.30% for Category V, Postdoctoral Scholars and Fellows, for fiscal year 2018 (July 1, 2017, through June 30, 2018). If this proposal is funded, the rates quoted above shall, at the time of funding, be subject to adjustment for any period subsequent to June 30, 2018, if superseding Government approved rates have been established. Fringe benefit rates are negotiated and approved by the Office of Naval Research, Penn State's cognizant federal agency.

- ✓ **Recovery of Indirect Costs (F&A)** -- A similar statement should be included for off-campus research and for on- and off-campus instruction/outreach.
- ✓ **F&A – On Campus Research:**

F&A rates are negotiated and approved by the Office of Naval Research, Penn State's cognizant federal agency. Penn State's current provisional on-campus rate for research is 58.3% of MTDC from July 1, 2017, through June 30, 2018. New awards and new competitive segments with an effective date of July 1, 2018, or later shall be subject to adjustment when superseding Government approved rates are established. Per 2 CFR 200 (Appendix III, Section C.7), the actual F&A rates used will be fixed at the time of the initial award for the duration of the competitive segment.
- *There are various lower/higher rates for Off Campus, Instructional, DOD, and Outreach Projects. Also sponsor's F&A restrictions are considered when drafting proposal budgets.*

Please note that industrially sponsored projects must add 5 percent to indirect costs, making the total for the federally negotiated rate 63.3% (58.3% + 5%).

COLLEGE RESEARCH SUPPORT

Contracts and Grants Management Office

- Assistance during sponsor identification
- Assistance in proposal process and preparation
- Selection and procurement of proposal formats
- Assistance with budget preparation
- Liaison to the Office of Sponsored Programs at UP
- Consultation on proposal content and format
- Liaison with the Office for Research Protections at UP
- Guidance on issues related to private consulting and intellectual property

College

- Research staff assistance is available at the school level, appropriate to the school's research activity level
- Assistance in special cases with identifying matching funds
- In recognition of excellence in research, a Faculty Research Award is presented annually
- Each school supports travel for research and scholarly activity
- Scientific, engineering, and computer equipment is purchased in support of faculty member research
- Funding opportunities can be found at <http://www.research.psu.edu/osp/find-funding/funding-searches>

Internal Grants

- **Undergraduate Research** (<http://behrend.psu.edu/research-outreach/student-research>)
 - ✓ Penn State Behrend Undergraduate Student Summer Research Fellowship
 - ✓ Penn State Behrend Undergraduate Student Academic Year Research Grant
- **Faculty Research**
 - ✓ Penn State Behrend Research Seed Grant Program
 - ✓ Schreyer Institute Grants (<http://www.schreyerinstitute.psu.edu/Grants/>)

CONFIDENTIALITY AND INTELLECTUAL PROPERTY ISSUES

The following statements cover most aspects of faculty member and/or student interactions with outside organizations.

Initial answers to questions may be found at (<https://www.research.psu.edu/osp>).

Confidentiality

- **Keep in mind the University Intellectual Property Agreement form that you signed when you were hired.**
 - Don't give away your ideas until you are covered by a confidentiality agreement.
 - No faculty member, staff member, or student shall sign a confidentiality agreement with an outside organization prior to OSP review of agreement.
 - A faculty member shall not sign a confidentiality agreement with an outside organization on behalf of a student.
 - An undergraduate student may be asked to sign a University confidentiality agreement based on a research agreement that has been issued to an outside organization.
 - All confidentiality agreements from outside organizations shall be forwarded to the Contracts and Grants Management Office (CGMO) and in turn will be forwarded to the Office of Sponsored Programs (OSP) for signature by an authorized official of the University.
 - In most cases, confidentiality issues with outside organizations will be covered by a University agreement. To request a Confidential Disclosure Agreement go to <https://www.research.psu.edu/osp/nda-request-form>. This should be filled out, submitted to OSP with a cc to the CGMO. OSP staff will select the appropriate agreement.

Intellectual Property and Contract Issues (<http://www.research.psu.edu/policies/>)

- In general, services to an outside organization that are of short duration, less than \$20,000 of direct costs, which include no transfer of University intellectual property and no federal flow through, can be covered by a Memorandum of Agreement. Appropriate indirect costs should be included in all cases. Check with CGMO prior to submitting cost estimations to sponsoring organization.
- In general, projects which include longer-term research services to an outside organization and which exceed \$20,000 of direct costs, and which include no transfer of University intellectual property, and no export constraints, could be handled by a Fixed Price Agreement or similar research agreement, if sponsoring agency approves contract language of agreement. Appropriate indirect costs should be included in all cases
- All research projects with an outside organization that involve the addition of intellectual property should be handled through the Office of Sponsored Programs. Appropriate indirect costs should be included in all cases. Contact CGMO prior to submitting cost estimations to sponsoring organization.
- When the University has the potential to conduct multiple projects with a single company, a Master Research Services Agreement may be appropriate. Contact CGMO for additional details.
- In general, if an undergraduate student or faculty member adds sufficient intellectual property to a project, they can be named on the patent as either inventor or co-inventor.
- Interactions with outside organizations, which may have understandings as Gifts, Charitable Gifts, Unrestricted grants should follow PSU policy guidance under the title of RA04 at <https://policy.psu.edu/policies/ra04>.
- Copyright issues, technology transfer, IP ownership, royalty payments, courseware, and Co-Authorship are covered under Intellectual Property Policy link at <https://policy.psu.edu/introduction-intellectual-property-policies>

Software Licensing

The purchasing agent for computers within the University Department of Purchasing Services signs all software licenses. If a fee is associated with the license, the purchasing agent requires a purchase order number or a budget number to which the fee will be charged. If no fee is involved, software license needs to be approved by Risk Management through CGMO.

RESEARCH INVOLVING HUMAN SUBJECTS

This procedure covers research activities that will: 1) result in a publication or product for use outside of the college; 2) incorporate non-university human subjects; 3) include any medical procedures; 4) include potentially controversial questions; and 5) involve minors, the elderly, or other special populations. All relevant policies and forms can be found at (<https://www.research.psu.edu/orp/>).

Follow the procedure outlined below:

- Determine if your research requires approval by the Office for Research Protections (<https://www.research.psu.edu/orp/humans>). If approval required, complete online orientation; you need do this only once. (<http://www.research.psu.edu/training/irb-basic-training>)
- All **NEW** applications for studies involving human research participants must be submitted using the IRB eSubmission process (PRAMS) located at <http://www.prams.psu.edu>. Paper applications for **NEW** studies are no longer accepted and will be returned.
- For newcomers, we recommend a tour of the eSubmission process located on the PRAMS home page - click on "Take the eSubmission Tour."

If you have questions or require assistance with this process, contact CGMO.

RESEARCH WITH CONFLICT OF INTEREST (<https://coins.psu.edu>)

COINS is the site used by all Penn State individuals to electronically complete and submit their Significant Financial or Business Interest Disclosures on a yearly basis as required by Penn State's Individual Conflict of Interest Policy (RA20). This site is not intended to be educational in nature. If you would like to understand better what is required of Penn State researchers under the Individual Conflict of Interest Policy, read the policy and its accompanying guidelines, or get started with conflict of interest documentation by clicking on the links on the Web site.

If you are looking for more comprehensive information about financial conflict(s) of interest related to research or other scholarly activities as well as conflict of interest committee information, please visit the Office for Research Protections Web site www.research.psu.edu/orp/coi. Also consult the following:

- COI Individual Guideline and Policy RP06, <http://guru.psu.edu/policies/RP06.html>
- COI Institutional COI Policy AD83, <http://guru.psu.edu/policies/AD83.html>
- COI Office Location: Office for Research Protections (ORP)
The Pennsylvania State University
The 330 Building, Suite 205
University Park, PA 16802
Phone: 814-865-1775; Fax 814-863-8699
Email: COIstaff@psu.edu
<https://coins.psu.edu>

SCHOLARSHIP AND RESEARCH INTEGRITY (<http://www.research.psu.edu/training/sari>)

SARI, the Scholarship and Research Integrity program, provides full-time faculty members, graduate students, and undergraduate researchers with opportunities to identify, examine, and discuss ethical issues relevant to their disciplines. The University is leading the way in ensuring that researchers conduct their work with integrity and responsibility. A variety of Collaborative Institutional Training Initiative (CITI) courses are available, and all meet the SARI@PSU program requirements. Faculty members may choose from Responsible Conduct of Research (RCR) courses, Institutional Review Board (IRB) courses, and shorter refresher courses (if you have had previous training). Please note that RCR courses do NOT meet the IRB requirements for human participant research.

PRIVATE CONSULTING PRACTICE (Policy HR80)

(<http://guru.psu.edu/policies/OHR/hr80.html>)

- **Purpose**

To outline the conditions governing private consulting by individuals classified as full-time academic or academic administrator. For an activity to be considered legitimate private consulting, the activity must be in the faculty member's field and be of a professional nature.

- **Duty**

A faculty member is expected to perform his or her University duties in the most effective manner of which he or she is capable. The faculty member's first duty and first responsibility is to the University. Outside service should not be undertaken, whether with or without pay, that might interfere with the discharge of this paramount obligation.

- **Consulting Time**

A member of the faculty may engage in a limited amount of private consulting within the parameters established in policy IP06 (<http://guru.psu.edu/policies/IP06.html>), Technology Transfer and Entrepreneurial Activity (Faculty Research). In accordance with IP-06, a faculty member may engage in consulting up to a maximum of four days per month with the understanding that it may not interfere with the performance of University duties or other contractual obligations of the University involving the faculty member and that the consulting enhances his/her professional stature or academic proficiency.

- **Required Approval**

Faculty members are to inform their school director or chancellor of the type and extent of their outside activities, whether undertaken for compensation or otherwise, so that the school director or chancellor may judge the appropriateness of the activity in relation to the performance of the faculty member's regular duties.

A faculty member may not provide special service to the Commonwealth for additional compensation without prior written approval of the President of the University (see HR42) (<http://guru.psu.edu/policies/OHR/hr42.html>). A faculty member requesting approval for such service to the Commonwealth shall submit his or her request to the President describing the service, the approximate time required, personal compensation expected, and the effect of such service on the faculty member's regular work.

- **Responsibility for Private Professional Services**

The University assumes no responsibility for private professional services performed by members of its faculty. ***The name of the University is not in any way to be connected with the service rendered or the results obtained.*** The faculty member must make it clear that his or her consulting work is a personal matter. He or she must not use the official stationery of the University or stationery having a University address or a University telephone number. A faculty member shall not accept or retain employment, which would bring him or her as an expert or in any other capacity, into conflict or in competition with the interests and purposes of the University or The Commonwealth of Pennsylvania and federal agencies.

- **Internal Consulting**

Faculty and staff members are ineligible to serve through third-party intermediaries, as paid consultants on University programs whether funded from general University or external grant or contract monies. When such collaboration is required, the faculty or staff member should participate directly in the project and his or her salary should be distributed accordingly.