

Research Guide

2021

VPRI Information Updated January 2024

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UNBC RESEARCH GUIDE

Knowledge creation and dissemination are important mandates of UNBC. Our faculty, staff and students are making highly valuable research contributions to these mandates. The Office of Research and Innovation continues to foster this research ethos at UNBC. The purpose of this guide is to assist our researchers and research partners to ensure that we provide them with key information to meet their research goals. This guide is a living document; therefore, please provide us with any feedback you may have to improve it.

ORGANIZATIONAL STRUCTURE

Office of the Vice-President, Research and Innovation

The Vice-President, Research and Innovation (VPR) is an advocate and facilitator of UNBC research locally, nationally and internationally. One of the major roles of the VPR is to ensure that multidisciplinary research clusters and groups are continuously sought and developed while keeping the UNBC research community abreast of new developments and opportunities. The VPR ensures that UNBC continues to develop research partnerships with private and public sectors and identifies discoveries and new knowledge that can be transferred to appropriate receptors resulting in societal benefits. University Research is complex and multifaceted. The VPR ensures that all research is conducted with strict adherence to the highest ethical standards while meeting all legal requirements. Paula welcomes the opportunity to meet with researchers and work with them to ensure that conducting research will remain a rewarding experience. Please visit our website https://www2.unbc.ca/research for additional information.

Primary Contact: Dr. Paula Wood-Adams



Vice-President, Research and Innovation Email: paula.wood-adams@unbc.ca Phone: 250-960-6110 / Fax: 250-960-5156 Executive Assistant to the Vice-President, Research and Innovation Email: <u>nicole.legault@unbc.ca</u> ext. 6687 Website: https://www2.unbc.ca/research

Office of Research and Innovation

The Office of Research and Innovation (ORI) provides support to UNBC researchers in identifying research opportunities and ensures that adequate support is available during the preparation and execution of the research proposals. Research Universities are expected to train and produce future scholars and leaders, along with being strong partners in regional and national innovation and prosperity initiatives. The ORI is committed to enhancing UNBC research successes and to be relevant to our researchers and our community in Northern British Columbia. We encourage you to visit our office, located on the first floor of Charles McCaffray Hall in room 1065 (CMH-1065).

MISSION AND VISION STATEMENTS

MISSION STATEMENT

To grow capacity and opportunities for research and creative activities at UNBC by engaging our people and partners, leading to the discovery of new knowledge that has transformative academic, economic or social benefit for the region, province, nation, and beyond.

VISION STATEMENT

To build a flourishing research culture facilitated by state-of-the-art infrastructure and efficient support services, enabling UNBC scholars to undertake leading-edge local, national, and international research with respect for humanity and nature.

SUMMARY OF RESEARCH RESOURCES AND SUPPORT SERVICES

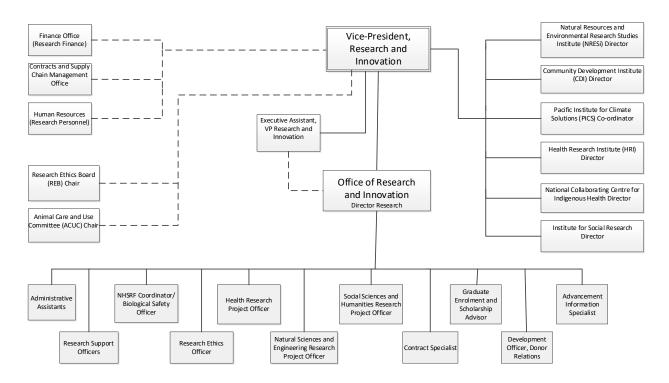
The ORI is the primary contact for the federal granting agencies (CIHR, NSERC, and SSHRC), government ministries, industry, associations, and foundations that typically provide financial support for scholarships, research and creative activities. The ORI exists to promote and enhance the success of research by faculty, students, and partners of UNBC. We do this by:

- providing faculty members with support services to develop outstanding research programs in all disciplines, including offering advice on sources of funding, helping develop proposals, providing institutional letters of support, and negotiating funding agreements;
- ensuring that we meet or exceed all relevant regulatory standards for research, maintaining our eligibility for funding from the agencies with the most stringent standards;
- assisting with maintaining and growing our research infrastructure;

- assisting with the development of research partnerships with local, provincial, national, and international agencies and industry collaborators;
- supporting technology transfer and commercialization of research discoveries;
- managing and maintaining relationships with major research funding agencies, so that the local research community has access to the best advice on successful research funding strategies, and acting as the primary institutional contact for these agencies;
- engaging in high-level advocacy with all levels of government to promote an environment in which world-class research may flourish at UNBC.

For more information, visit: <u>https://www2.unbc.ca/research</u>.

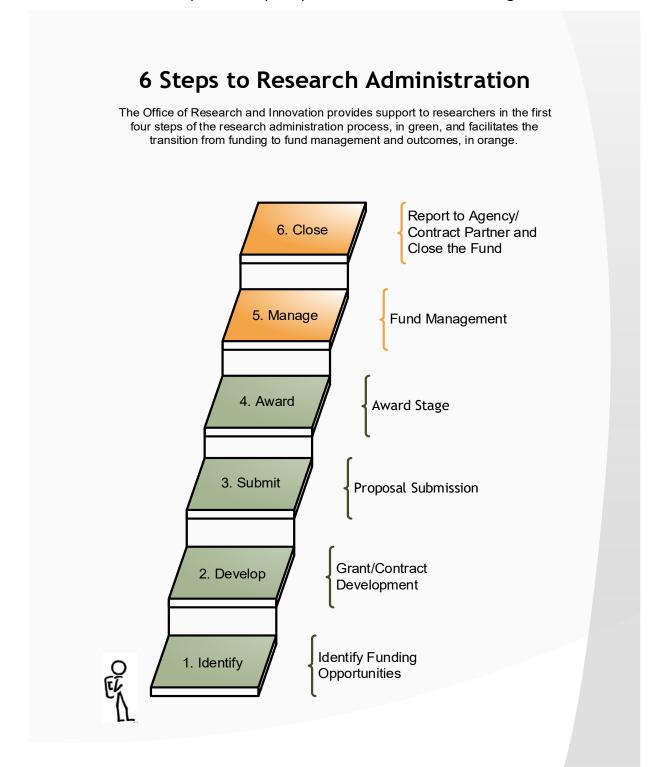
Office of Research and Innovation Organizational Chart

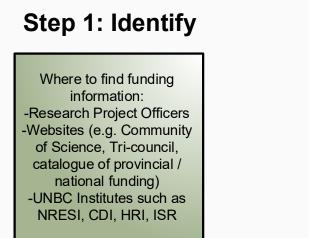


Office of Research and Innovation Organizational Chart

6 Steps to Research Administration

Below is a visual road map to the steps required to access research funding.

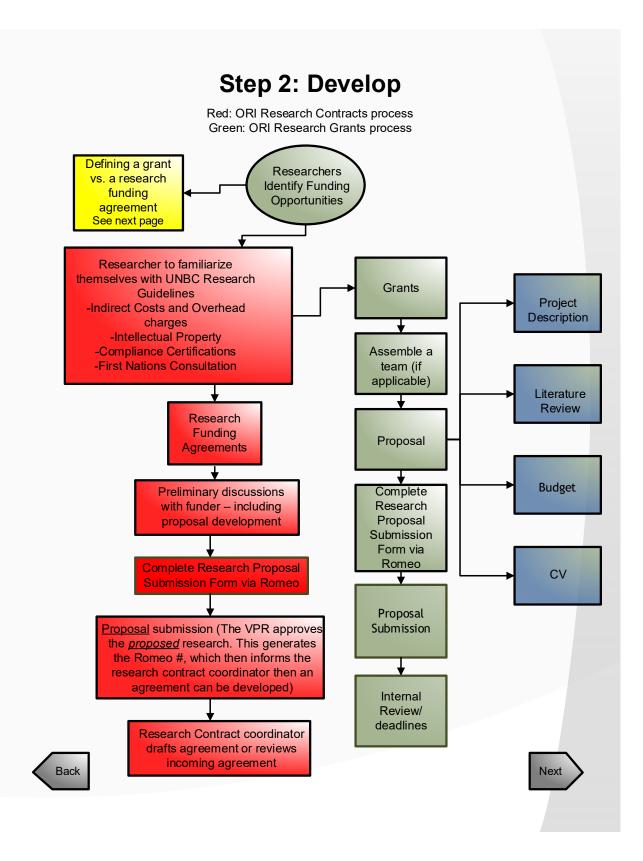






Office of Research and Innovation Contacts: https://www2.unbc.ca/research/contact

Next



Step 2: Develop cont'd

Defining a grant vs. a contract

What is the difference between a contract and a grant?

The determination of whether a funding agreement is a grant or a contract is not always clear. One way to differentiate them relates to the expectation of set deliverables. While both grants and contracts are legally binding agreements, funds are *granted* to a researcher with an expectation - but not the requirement – that the task can be accomplished. A funding agreement with a defined scope of work, obligations and responsibilities can include ramifications to the researcher or institution if the task is not accomplished.

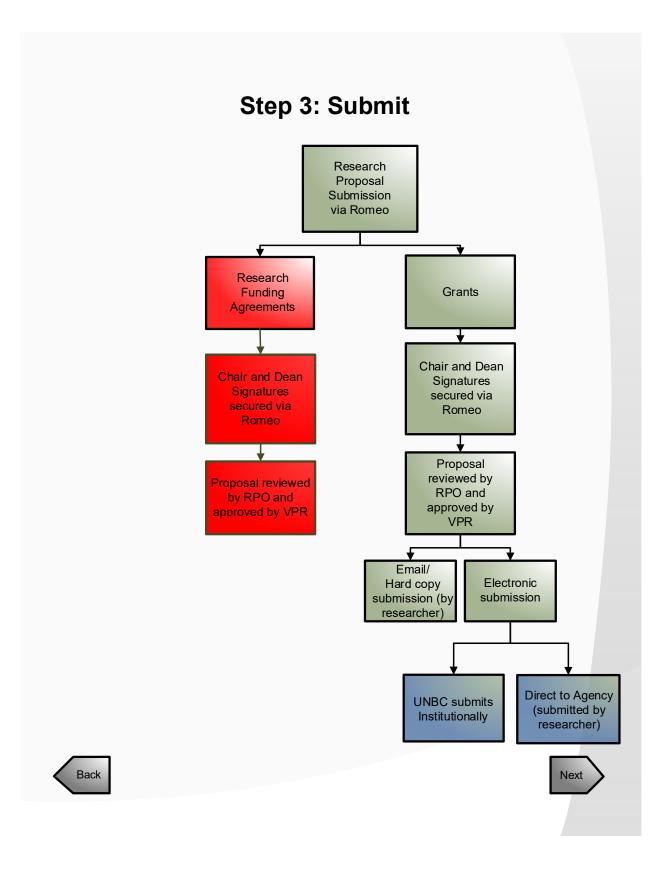
| Grant | Contract |
|---|--|
| Likely no confidentiality restrictions | Could require signing a confidentiality agreement |
| Ownership of any intellectual property resides with the institution | Includes intellectual property options and licensing arrangements |
| Unrestricted rights to publish research results without pre-review or time delay involving the sponsor | Includes intellectual property options and licensing arrangements |
| Annual renewal - no termination provisions | Termination provisions |
| Flexible time frame; no detailed schedule of work. Research proposal and direction of research lies with the researcher | Detailed work schedule, including milestones and date for final deliverables. Restrictions on scope of research |
| Few deliverables - could be progress or final report | Specific deliverables, report requirements and timelines defined |
| Funds are paid in advance or in installments to the University | Payments are based on actual expenditures, some portion of the payment may be withheld (holdbacks) until the final report is submitted and accepted |
| The project/budget can be changed by the principal researcher without notice | Changes to scope of work-budget could require consent of sponsor |
| There is no honorarium or other payment to the principal researcher and co-investigators | Can include honorarium to the principal researcher and co- investigators |
| Ownership of equipment purchased for project vests with University | Equipment purchased for project may revert back to sponsor at conclusion of project |

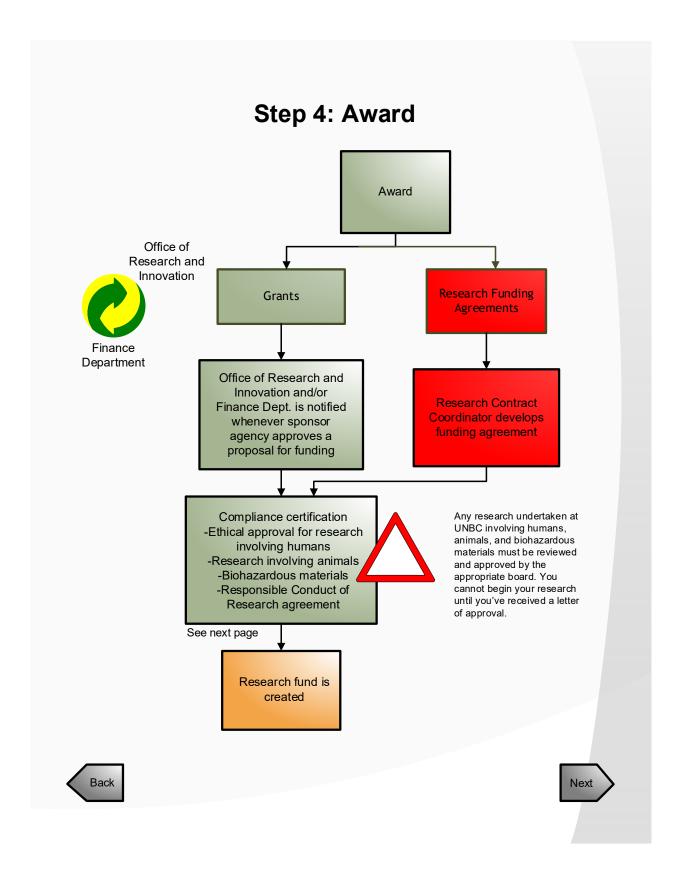
Negotiation and Administration of Research Agreements

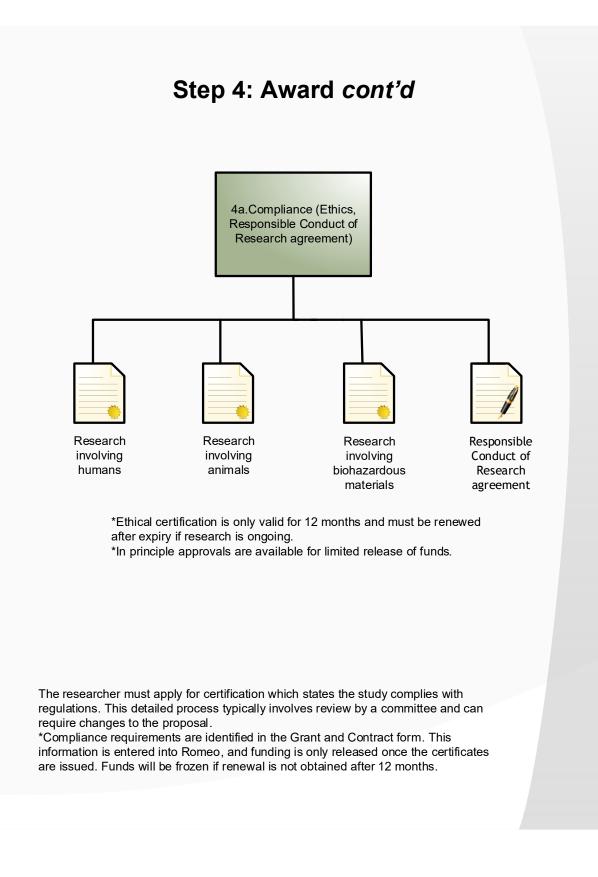
Only the University has the authority to enter into research agreements that are binding on the University. This includes funding agreements, transfer agreements, contribution agreements, service agreements and the like. Thus, agreements concerning research undertaken at the University must be between the Governing Board of the University of Northern British Columbia and the sponsoring agency, and <u>cannot</u> be written in the name of an individual, Department, Institute, Centre, School, or Faculty. All agreements and proposals concerning research must first be reviewed by the Office of Research and signed by the Vice President Research to be legally binding.

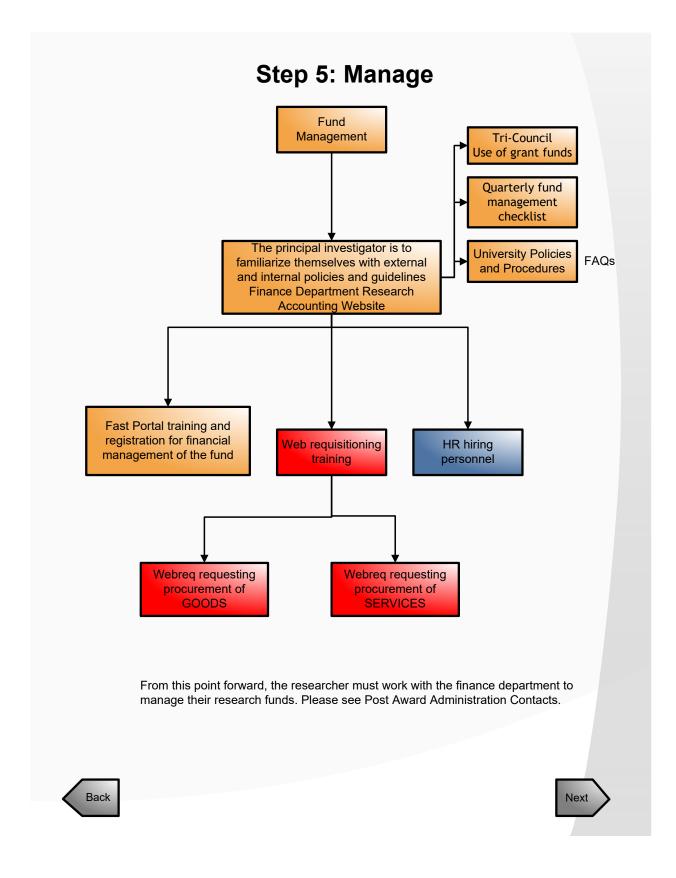
Types of Agreements

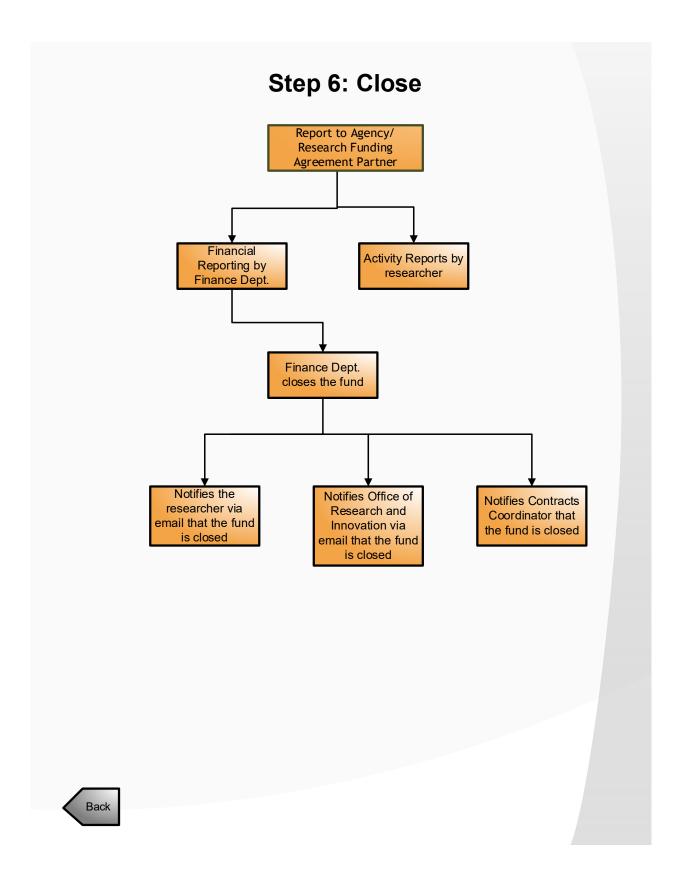
| Incoming \$ | Outgoing \$ | Other |
|---------------------------------|--------------------------------|-------------------------------|
| Grants | Funding transfers (sub-awards) | Non-disclosure |
| Contribution agreements | Research services contracts | Material transfer |
| Service (consulting) agreements | | Data use |
| | | Research collaborations |
| | | Community research agreements |
| | | Intellectual property |
| | | MOUs |
| | | Waivers |











CONTACTS

PRE-AWARD ADMINISTRATION CONTACTS

OFFICE OF RESEARCH AND INNOVATION

The ORI oversees all matters pertaining to pre-award research at UNBC. Any questions, concerns, or queries should be directed to a member of the ORI. Current contact information can be found on the ORI website: <u>https://www2.unbc.ca/research/contact</u>. All research grant applications and contracts must meet university requirements as set out by the ORI. This includes the proper and timely completion of forms, proposals, and any other required documentation.

Finding suitable sources of funding is a continuous process. It is important to keep up to date with opportunities for funding through the emails provided by the ORI and information provided on the website: <u>https://www2.unbc.ca/research/funding-opportunities</u>.

The ORI ensures that pre-award documentation is completed according to the policies and procedures of UNBC, granting agencies, foundations, and other entities. The <u>Research Support</u> section of our website provides information about Romeo, Research Guides and Forms.

POST-AWARD ADMINISTRATION CONTACTS

RESEARCH ACCOUNTING OFFICE

The Research Accounting Office is committed to providing fiscal accountability for faculty-held research funds from public and private sectors by maintaining, monitoring and disseminating data between the sponsor, faculty and administration. Our staff will help disburse your funds and track your spending.

Website: <u>https://www2.unbc.ca/finance/research-accounting</u> General email: finance@unbc.ca

CONTRACTS AND SUPPLY CHAIN MANAGEMENT

The Contracts and Supply Chain Management department procures materials, supplies, equipment and services required by UNBC faculty, staff and researchers.

Website: https://www2.unbc.ca/contracts-supply-chain-management

SAFETY AND RISK MANAGEMENT

The Risk and Safety Office provides state of the art, centralized health and safety services in support of the university's mandate.

Website: <u>https://www2.unbc.ca/safety</u>

OTHER CONTACTS

| Group | Website |
|---|--|
| Animal Care and Use Committee (ACUC) | https://www2.unbc.ca/research/research-ethics-safety-animal-subjects |
| Human Resources | https://www2.unbc.ca/human-resources |
| Indigenous Initiatives | Manager, Indigenous Initiatives 250-960-5106 <u>https://www2.unbc.ca/indigenous-resource-dati</u> |
| IT Services | https://support.unbc.ca/CherwellPortal/IT |
| Research Ethics Board | https://www2.unbc.ca/research/research-ethics-safety-human-participants |

RESEARCH FACILITATION NETWORK

Research Institutes and Facilities

A wide variety of institutes and facilities exist to facilitate research at UNBC.

| Institute or Facility | Website |
|--|---|
| Aleza Lake Research Forest (ALRF) | https://alrf.unbc.ca/ |
| Centre of Excellence in Data Privacy, Security and Integrity | https://www2.unbc.ca/research/centre-excellence-data- privacy-security-and-integrity |
| Community Development Institute (CDI) | https://www2.unbc.ca/community-development-institute |
| Centre for Technology Adoption for Aging in the North (CTAAN) | https://www.ctaan.ca/ |
| Dr. Donald Rix Northern Health Sciences Centre | https://www2.unbc.ca/northern-medical-program/campuses |
| Dr. Max Blouw Quesnel River Research Centre (QRRC) | https://www2.unbc.ca/quesnel-river-research-centre |
| Genetics Lab | https://www2.unbc.ca/genetics |

| GIS & Remote Sensing Lab | https://gis.unbc.ca/ |
|---|--|
| Health Research Institute (HRI) | https://www2.unbc.ca/health-research-institute |
| Herbarium | https://www2.unbc.ca/research/unbc-herbarium |
| High Performance Computing Lab (HPC) | http://web.unbc.ca/hpc |
| IK Barber Enhanced Forestry Lab (EFL) | https://www2.unbc.ca/enhanced-forestry-lab |
| Institute for Social Research (ISR) | https://www2.unbc.ca/institute-social-research |
| John Prince Research Forest (JPRF) | http://www.jprf.ca/home |
| National Collaborating Centre for Indigenous Health (NCCIH) | https://www.nccih.ca/en/ |
| Natural Resources and Environmental Studies Institute (NRESI) | https://www2.unbc.ca/nres-institute |
| Northern Analytical Laboratory Services (NALS) | https://www2.unbc.ca/northern-analytical-lab-service |
| Northern BC Archives | https://libguides.unbc.ca/archives/home |
| Pacific Institute for Climate Solutions at UNBC (PICS) | https://www2.unbc.ca/pacific-institute-for-climate-solutions |
| Research Data Centre (RDC) | https://library.unbc.ca/collections/data-statistics/rdc |
| Tree Ring Lab | https://www2.unbc.ca/dendro-lab |
| Urban Aboriginal Knowledge Network (UAKN) | https://uakn.org/research-centre/western-research-centre/ |
| Women North Network / Northern FIRE | https://www2.unbc.ca/northern-fire |

Research Chairs

UNBC hosts a number of research chairs. The holders of these research chairs are leaders in their fields and contribute to UNBC's success as a research-intensive university; enhancing UNBC's ability to carry out locally inspired and internationally significant research in our strategic research areas. **Website**: <u>https://www2.unbc.ca/research/research-chairs</u>

FINDING FUNDING

Funding Opportunities Directory

A list of prominent internal and external funding is available under the Funding Opportunities heading on the ORI website at <u>https://www2.unbc.ca/research/funding-opportunities</u>.

Internal Funding Opportunities at UNBC

UNBC researchers are eligible to apply for a number of internal grants administered by the ORI.

Please visit the Internal Funding Opportunities website for current opportunities, guidelines and application processes.

Applications for the BC Real Estate Foundation Partnering Fund, RDC Research Award, and RSIG must be completed and submitted via Romeo (<u>https://www2.unbc.ca/research/romeo</u>).

Website: https://www2.unbc.ca/research/internal-funding-opportunities

BC REAL ESTATE FOUNDATION PARTNERING FUND

The goal of the BC Real Estate Foundation Partnering Fund is to support research and educational programs, following objectives specified in the competition application form. Initiatives should involve collaboration among university entities and public, non-profit and/or professional organizations. Funding is available to faculty and graduate students, the latter with the agreement of their supervisor.

Website: https://www2.unbc.ca/research/real-estate-foundation-bc-partnering-fund-projects

RDC RESEARCH AWARD

The Office of Research and Innovation and Research Data Centre (RDC) have developed the RDC Research Award to support the development and implementation of research projects conducted in the RDC.

Website: https://www2.unbc.ca/research/internal-funding-opportunities

RESEARCH GRANT IN LIEU OF SALARY

To permit, under certain conditions, a faculty member, professional librarian, and academic administrator to receive a research grant in lieu of salary, through a mechanism which includes peer review.

Please see the UNBC policy titled *Research Grant in Lieu of Salary* for more information at: <u>https://www2.unbc.ca/policy</u>.

Website: https://www2.unbc.ca/research/internal-funding-opportunities

RESEARCH STRATEGIC INITIATIVES GRANT (RSIG)

The Research Strategic Initiatives Grant (RSIG) welcomes requests from all UNBC faculty, research organizations, graduate and undergraduate student groups engaged in research. Funds are directed towards research activities for which other sources of funding are not available.

Website: https://www2.unbc.ca/research/internal-funding-opportunities

UNIVERSITY ACHIEVEMENT AWARD-RESEARCH

The University Achievement Award for Research seeks to acknowledge Faculty Association Members who are deemed exceptional researchers and scholars.

Website: https://www2.unbc.ca/research/internal-funding-opportunities

External Funding Opportunities

Please visit the UNBC Office of Research and Innovation website (<u>https://www2.unbc.ca/research/funding-opportunities</u>) for a list of the most common sources of external funding for UNBC research.

TRI-AGENCY GRANTS

CANADIAN INSTITUTES OF HEALTH RESEARCH

The **Canadian Institutes of Health Research (CIHR)** provides funding opportunities for four themes of health research: Biomedical; Clinical; Health systems services; and Social, Cultural, Environmental and Population Health. This integrated approach brings together researchers, health professionals, and policy-makers from voluntary health organizations, provincial government agencies, international research organizations and industry, and patient groups from across the country. CIHR is undergoing a number of changes and refining its funding mandates. In order to receive up-to-date information, including deadlines, please visit the agency's website: <u>https://cihr-irsc.gc.ca/e/193.html</u>. The ORI will provide updated information in a timely manner as they are received by the agency.

NATURAL SCIENCES & ENGINEERING RESEARCH COUNCIL

The **Natural Sciences & Engineering Research Council (NSERC)** supports both basic university research through Discovery Grants and project research through partnerships among universities, governments, and the private sector, as well as the advanced training of highly qualified personnel. NSERC's role is to make investments in people, discovery, and innovation for the benefit of all Canadians. To learn the most up-to-date information, including deadlines, please visit the agency's website: <u>https://www.nserc-crsng.gc.ca/index_eng.asp</u>.

SOCIAL SCIENCES AND HUMANITIES RESEARCH COUNCIL

The **Social Sciences and Humanities Research Council (SSHRC)** is the federal agency that promotes and supports university-based research and training in the humanities and social sciences. SSHRC programs also provide support for research training and communication activities. SSHRC administers the Canada Research Chairs Program (see External Funding Opportunities above). SSHRC partners with a variety of government, business, and non-profit organizations to develop and fund strategic research programs. Please visit the agency's website to remain most current with the events sponsored by SSHRC, including deadlines: https://www.sshrc-crsh.gc.ca/home-accueil-eng.aspx.

PREPARING YOUR GRANT APPLICATION

It is up to the researcher to familiarize themselves with the research related policies and procedures that exist at UNBC. Please see attached <u>Appendix A</u>.

Grant Applications: Before you Begin

Find a funding source to meet your research goals and objectives. Contact the ORI for assistance. Before completing the application, be sure to have well thought-out objectives and a clear research plan.

The ORI hosts information sessions and workshops that will aid in crafting your grant proposal. Information on research events will be regularly updated on the ORI website and distributed by email. However, the best way to keep up to date is by staying in contact with the respective Research Project Officer.

Eligibility Requirements

Review the funding sponsor's eligibility criteria to ensure that you are eligible to apply for the grant.

Proposal Development

Contact your Program Chair, Dean, the VPR, and/or a Research Project Officer in the ORI. You may be eligible for faculty-specific seed funding programs or other awards to support development of new proposals. For more information, see the Internal Funding Opportunities at UNBC listed in this guide or listed on the website: <u>https://www2.unbc.ca/research/funding-opportunities</u>

Equity, Diversity and Inclusion

Please consider the following in advance of and in the preparation of your research proposal:

Please review the following resources to ensure that you are familiar with all aspects of EDI and your research proposal is well aligned with all of the current guidelines.

EQUITY, DIVERSITY AND INCLUSION

UNBC has endorsed the Tri-Council <u>Dimensions: Equity</u>, <u>Diversity and Inclusion Canada Charter</u> and the <u>Universities Canada Inclusive Excellence Principles</u>. In support of an equitable, diverse and inclusive research and teaching environment, UNBC researchers must consider EDI principles when building their research teams and preparing their training plans. Researchers are advised to consider these principles well in advance of preparing a grant application.

- Equity, Diversity and Inclusion at UNBC: <u>https://www2.unbc.ca/equity-diversity-inclusion</u>
- Best practices in Equity, Diversity and Inclusion in Research is a resource developed by the Tri-Agencies for applicants to the New Frontiers in Research Fund competitions, however, applicants to any funding opportunity will find this to be a helpful resource: <u>https://www.sshrc-crsh.gc.ca/funding-financement/nfrf-fnfr/edi-eng.aspx</u>
- CIHR Resources: <u>https://cihr-irsc.gc.ca/e/51709.html</u>
- NSERC Best Practices Guide: <u>https://www.nserc-</u> crsng.gc.ca/ doc/EDI/Guide for Applicants EN.pdf

UNCONSCIOUS BIAS

- CIHR Resources: <u>https://cihr-irsc.gc.ca/e/51709.html</u>
- CRC Resources: <u>https://www.chairs-chaires.gc.ca/program-programme/equity-equite/bias/module-eng.aspx?pedisable=false</u>

INDIGENOUS RESEARCH

Indigenous Research is defined by SSHRC as "research in any field or discipline that is conducted by, grounded in or engaged with First Nations, Inuit, Métis or other Indigenous nations, communities, societies or individuals, and their wisdom, cultures, experiences or

knowledge systems, as expressed in their dynamic forms, past and present." Regardless of the methodologies used, researchers who conduct Indigenous Research must do so by building "respectful relationships with all Indigenous peoples and communities" (SSHRC). Researchers should be aware that it takes time to build reciprocal, trusting relationships and that First Nations, Inuit and Métis people must have a role in shaping the research that affects their communities (TCPS 2 (2018) – Chapter 9).

- UNBC Indigenous Resource Dati: <u>https://www2.unbc.ca/indigenous-resource-dati</u>
- CIHR Resources: <u>https://cihr-irsc.gc.ca/e/51709.html</u>
- SSHRC/NSERC Resources: <u>https://www.sshrc-crsh.gc.ca/society-societe/community-communite/indigenous_research-recherche_autochtone/index-eng.aspx</u>
- Truth and Reconciliation Commission of Canada: Calls to Action: <u>https://www2.gov.bc.ca/assets/gov/british-columbians-our-governments/indigenous-people/aboriginal-peoples-documents/calls to action english2.pdf</u>
- United Nations Declaration on the Rights of Indigenous Peoples: <u>https://www.un.org/development/desa/indigenouspeoples/declaration-on-the-rights-of-indigenous-peoples.html</u>

SEX AND GENDER BASED ANALYSIS (SGBA+)

• CIHR Resources: <u>https://cihr-irsc.gc.ca/e/50833.html</u>

Budget Development

It is important for the researcher to understand the cost of performing research as it is the researchers who are entirely responsible for their budget.

Please see the *Quarterly Fund Management Checklist* to help with financial management of research projects at:

https://www2.unbc.ca/sites/default/files/sections/finance/quartely_checklist.pdf

DIRECT COSTS

Direct costs of research include salary and benefits of researchers, payroll costs of PDFs and research assistants, consultants, consumables, taxes, equipment and capital expenditures, materials and supplies, sometimes space cost (per area), travel, and any applicable taxes.

ELIGIBLE USE OF FUNDS

Eligible expenses are determined by the sponsor or funding agency. For example, Tri-Agency (CIHR, NSERC, and SSHRC) information on expenses can be found at: <u>https://www.nserc-crsng.gc.ca/InterAgency-Interorganismes/TAFA-AFTO/guide-guide_eng.asp</u>

PERSONNEL

Information on budgeting for research personnel is included in the section titled "<u>Research</u> <u>Personnel</u>".

SALARIES AND BENEFITS

In many cases, such as in the case of Tri-Agency grants, the salary of the principal investigator is not an eligible research expense. However, for more information, or for unique cases involving in-kind contributions of the principal investigator's compensation, please consult with the ORI. Please see the section of the guide titled <u>Pre-Award Administration Contacts</u> for their contact information.

Please contact HR as listed in the <u>Other Contacts</u> section above for clarification of all other queries on salaries and benefits.

TRAVEL AND ACCOMMODATION

The procedures that all UNBC employees must follow when incurring travel-related expenses are included in the *Travel Reimbursement* policy found at: <u>https://www2.unbc.ca/policy</u>.

In cases of Tri-Agency travel expenses, the *Travel Claims* document can be viewed at: <u>https://www2.unbc.ca/sites/default/files/sections/finance/travel-claim1.pdf</u>.

Please contact HR and/or Research Accounting as listed in the <u>Other Contacts</u> section above for more information.

SPACE

If this is an eligible expense, contact Facilities for current space costs for your area.

Douglas Kean, Capital Projects & Space Allocation Coordinator Phone: 5158 Email: <u>douglas.kean@unbc.ca</u> Website: <u>https://www2.unbc.ca/facilities</u>

TAXES

Researchers must account for taxes when assembling their budgets. GST has an after rebate rate of 1.65% and PST has a rate of 7%.

Please see the following website for what taxes apply to which expenses: <u>https://www2.gov.bc.ca/gov/content/taxes/tax-changes/whats-new/sales-taxes?keyword=whats&keyword=taxable</u>

INDIRECT COSTS

The indirect costs of research are also known as *overhead costs, facilities and administrative* costs, or *facilities and services* costs. They are the operating expenditures that UNBC incurs to undertake its research mandate; they do not include expenses which are directly associated with the research project (e.g., researcher salaries, researcher travel expenses, student stipends, research materials, etc.). These indirect costs include, but are not limited to, the provision of institutional facilities; space within those facilities (including the costs of maintenance and utilities); maintenance, repair, and even replacement costs of research and other equipment*; computing resources; library resources; insurance; technical support for communal equipment and facility operation; intellectual property management costs; etc.

Overhead, or indirect, costs on grants are an eligible expense and must be included in the budget for all contracts, contract proposals, and contract letters of intent. UNBC holds a minimum of 25% rate.

UNBC *Indirect Costs and Overhead Charges for Research and for Instructional Services Surpluses* Policy can be found at:

https://www2.unbc.ca/sites/default/files/sections/finance/indirect costs and overhead charg es for research and for instructional services surpluses 2.pdf

*Equipment maintenance repairs in the laboratory building must follow the UNBC policy *Equipment Maintenance Repairs in Laboratory Building* at: <u>https://www2.unbc.ca/policy</u>.

For any questions about the above costs, please contact the Office of Research and Innovation (research@unbc.ca).

Website: <u>https://www2.unbc.ca/research/</u>

Follow Application Guidelines Exactly

Each granting agency or foundation has their own guidelines and what they would like to see in an application. The success of your application will depend on your ability to convince the reviewer(s) about the importance of the proposed work and your or your team's ability to conduct the proposed research. To this end, the ORI offers grant writing workshops, which includes imparting grant writing tips. A number of grant writing tips are also available online by the funding agencies. Some of these are listed below.

Note: If your research involves Aboriginal communities directly or indirectly, please contact the Assistant Provost, Indigenous Initiatives in the Office of Indigenous Initiatives for advice. Contact information can be found above in <u>Other Contacts</u>.

Please contact the appropriate Research Project Officer for additional help, including one-on-one grant writing consultations with a draft grant proposal. This information can be found above in the <u>Pre-Award Administration Contacts</u> section or at: <u>https://www2.unbc.ca/research/contact</u>.

We strongly recommend that you build in time to have your proposal reviewed by a colleague for invaluable peer feedback. Researchers should feel free to arrange for their own peer review or contact the Office of Research and Innovation a minimum of 6 weeks in advance of the agency deadline and the Office would be happy to arrange for peer review on the researcher's behalf.

CONTRACTS

PROCEDURES FOR CONTRACT NEGOTIATION

If you are arranging a research contract with an industry partner, government agency or other organization, please submit your funding proposal along with the completed External Grant and Contract Form via Romeo to the ORI at least 5 business days prior to the deadline for proposal submission. Your proposal will then be reviewed by one of the Research Project Officers.

The purpose of the review is to ensure that:

- your application is complete;
- your budget is in accordance with UNBC rates and policies, is well justified, and includes an overhead cost (25% (or higher) of the total request);
- your application is free of spelling and grammatical errors;
- your application is well presented.

The completed External Grant and Contract Form information is then used to establish a fund/org number which enables the distribution of funds if your proposal is successful.

Once your proposal has been reviewed and approved, you can submit your proposal to the UNBC Research Contract Coordinator in the ORI for preparation of the legal contract.

Please feel free to contact one of the Research Project Officers or the Research Contract Coordinator to discuss your proposal and/or contract requirements and seek advice or guidance regarding your ideas and potential funding focus. We are here to facilitate the research funding process and work in partnership with you to submit successful proposals.

As a final step, please advise the Office of Research and Innovation whether or not your proposal was successful.

The policy is found at: <u>https://www2.unbc.ca/policy.</u>

SUBMITTING YOUR GRANT APPLICATION

UNBC aims to hold the highest standards of accountability in the administration of its research activities. UNBC has a process in place for the submission of applications and for the use of research funds. By following these procedures, a sound and effective basis for accountability and ethical integrity takes place in research. Below is an overview of useful information that has been provided to assist in fulfilling your role in regard to research.

External Grant Application Submission Process

When you are ready to submit your grant application, please be sure to follow these steps:

Your completed grant application along with the completed External Grant and Contract Form must be received in the Office of Research and Innovation at least 5 business days prior to the funding agency deadline. Please allow enough time for Chair and Dean approval. Your application will then be reviewed by one of the Research Project Officers.

Please note: An External Grant and Contract Form is required any time funds will be transferred to UNBC (e.g. you are a co-investigator on a research project and a portion of the funds will be transferred to UNBC for your use).

The purpose of the internal review by the ORI is to ensure that:

- your application is complete;
- your application is consistent with all of the funding agency application requirements/guidelines;
- your budget is in accordance with UNBC rates and policies, and is well justified;
- your application is free of spelling and grammatical errors;
- your application is well presented.

In addition to ensuring that the highest quality grant applications are submitted by UNBC researchers, the internal review is necessary to ensure that the legal obligations and requirements of UNBC, the funding agency, and other stakeholders are met. As an institution, we endeavor to conduct research activities in accordance with the highest standards of professionalism, safety, and ethics.

Once your grant application has been reviewed and approved by the VPR, your application can be submitted to the funding agency. This may occur electronically through the ORI, as is the case for many Tri-Agency grants, online, via email, or as a hard copy, which is sometimes still required.

The completed External Grant and Contract information is then used to establish a fund/org number which enables the distribution of funds if your application is successful.

Please note: If you wish to have your grant application peer reviewed (i.e. to receive an expert opinion on the content), the ORI would be pleased to seek such expertise. Please allow 6 weeks for a peer review. Please also consult your unit for any process that is in place to enhance your success in the grant competition.

If your grant application requires an Institutional Letter of Support, please complete and submit the <u>Institutional Letter of Support Request Form</u> to the ORI at least 10 business days prior to the funding agency deadline. The information you provide on this form will assist Research Project Officers with the development of an Institutional Letter of Support. Please do not hesitate to contact one of the Research Project Officers to discuss your grant application and/or letter of support requirements.

As a final step, please advise the Office of Research and Innovation whether or not your application was successful.

You will find a quick link to Romeo on our website at: <u>https://www2.unbc.ca/research/romeo</u>, as well as links to all of our forms on our website at: <u>https://www2.unbc.ca/research/forms</u>.

Internal Grant Application Submission Process

INTERNAL FUNDING OPPORTUNITIES

Please visit the Office of Research and Innovation Internal Funding Opportunities <u>webpage</u> for current opportunities, guidelines and application processes.

Special Requirements & Ethics Review of Application

Some funding agencies and governing bodies specifically request that necessary certifications (e.g. Animal Care, Biohazard, and Research Ethics) are met prior to applying for the funding, or that necessary certifications are in place prior to funding release. Therefore, it is important to read the Research Guidelines of the sponsoring agencies carefully. Researchers are encouraged to contact the appropriate committee Chair to determine if there are special requirements that may impact the proposal's budget. For projects involving animal and human participants and requiring certification, please complete the Certifications and Registrations tab within the Grant/Contract Submission Form in Romeo, paying particular attention to questions 3.6, 3.7 and 3.8. If you require a release of funds prior to obtaining animal care or human ethics certification, you will need to agree to the conditions outlined in 3.7. You will also need to indicate by which time you plan to have certification approval in 3.8. Answering these questions will allow for setup of a 'Release of Funds' approval. Under the 'Release of Funds,' no research can be conducted with animal or human participants until the full certification approval has been obtained.

Any research activity involving the use of animals, biohazards, or human participants, must be approved by the appropriate certification committee prior to commencing such work. Please see the attached <u>Appendix B</u> titled "Research Requiring Certification" in this guide for more information, or visit Research Ethics & Safety online at: <u>https://www2.unbc.ca/research</u>.

BC Biobank Registration

Any research entity which collects, processes, stores, and/or uses human biospecimens and associated data for research purposes (including research projects, studies, clinical trials, and

formal multi-user biobanks) at a site in British Columbia will be required to register in the CTRNet Biobank Certification program.

Inclusion criteria for registration:

Biospecimen collections stored long-term (>3 months) for research use

Exclusion criteria:

- Biospecimen collections for industry-sponsored studies which are NOT stored long-term (>3months) at the site of collection
- Biospecimen collections used in their entirety for research analyses immediately or shortly after collection (<3 months)

Biobanks in British Columbia are required to register in the CTRNet Biobank Certification Program (<u>www.ctrnet.ca</u>). Registration is the first step of the certification program and involves completion of a short online form and introductory education module (1-3 hours of work). Completion of registration results in a **Registration Record** document. The requirement for registration will be implemented through existing institutional research approval processes.

To review the registration process and the educational module requirement, create an account at: <u>http://dev.biobanking.org/brc/users/signup/biobank-registration/ca_academic</u>

Meaning of Signatures

The UNBC policy and that of most external agencies requires that all outgoing applications for external research funding require the following minimum signatures:

- Principal Investigator indicates acceptance of academic, professional, scientific, and technical responsibility for the project. In addition, it represents an undertaking to observe sponsor and university policies and procedures, as well as any special award conditions. They have informed in writing the Chair and/or the Dean about any specific requirement that has to be made to conduct the proposed research.
- Program Chair, Faculty Deans and Division of Medical Sciences indicates that the department is willing to accommodate the project; that required facilities and services are available; and that the principal investigator meets known university and sponsor eligibility requirements. It also represents general acceptance of expressed or implied time commitments, including willingness to recommend leave or other special arrangements as specified in the application. It also asserts the fact that space and any alteration costs thereto are available from Faculty resources and that if this is not the case, they will obtain prior approval from the Provost and Vice-President, Academic (such approval to be attached), VP Research and Innovation or VP Finance and Administration as appropriate.
- Research Project Officer recommends to the VPR whether or not to approve the application. The Research Project Officer will leave comments regarding concerns with

the grant application for the VPR to consider. Common concerns pertain to noncompliance issues. These include non-compliance with institutional, funding agency, and government procedures, policies and laws.

 VPR - confirms that the institution will accept and administer funds in accordance with agreed terms and conditions or will negotiate acceptable terms if these are not established at the time of application; that all certification required to conduct research will be secured; that the principal investigator will have access to normal use of UNBC facilities and services.

For the purposes of research grant applications and contract proposals, institutional signing authority has been delegated to the VPR.

POST-AWARD ADMINISTRATION

Once your application is successful, a new research account must be established; typically one for each agency that is funding your project (if separate reporting is required). The ORI facilitates this process in collaboration with the Research Accounting Office and certification committees, if applicable.

General

UNBC, as a steward of the research funds provided through an award, has established a series of policies and procedures (see attached <u>Appendix A</u>) aimed at ensuring:

- the ability to comply with the regulations of the research sponsor;
- the proper management of the funds;
- accountability to the sponsor and other university stakeholders; and
- the effective conduct of the research activities in accordance with the highest standards of professionalism, safety, and ethics.

UNBC delegates the overall responsibility for the pursuit and management of the research proposal to the principal investigator as an employee of UNBC and as the person who is most knowledgeable about the research proposal. UNBC supports the principal investigator in meeting their responsibilities by providing organizational infrastructure to support compliance with the requirements of UNBC and the sponsor.

Principal investigators are responsible for conducting their research as indicated in the proposal, and for the overall sound administration of all research funds allocated to them, including:

- the proper allocation of research funds and sound financial management;
- human resource management and supervision of employees and students;
- ensuring a safe working environment;
- ensuring compliance with the terms and conditions governing the grant or contract; and

• ensuring that expenditures do not exceed the value of the award.

Release of Funds Procedure: Projects Involving Animals, Biohazards, or Human Participants

Any research activity involving the use of animals, biohazards, or human participants, must be approved by the appropriate certification committee prior to commencing such work. Please see the attached <u>Appendix B</u> titled "Research Requiring Certification" in this guide for more information, or visit Research Ethics & Safety online at: <u>https://www2.unbc.ca/research</u>.

For projects involving animal and human participants and requiring certification, please complete the Certifications and Registrations tab within the Grant/Contract Submission Form in Romeo, paying particular attention to questions 3.6, 3.7 and 3.8. If you require a release of funds prior to obtaining animal care or human ethics certification, you will need to agree to the conditions outlined in 3.7. You will also need to indicate by which time you plan to have certification approval in 3.8. Answering these questions will allow for setup of a 'Release of Funds' approval. Under the 'Release of Funds,' no research can be conducted with animal or human participants until the full certification approval has been obtained.

Financial Management

The Principal Investigator holds the full financial administrative responsibilities of the funds they receive. Moreover, it is required that the Principal Investigator adheres to the expectations and deliverables of the funding agency. Contact the ORI or the Research Finance Office for assistance.

Accountability of the research funds falls under the following categories:

FINANCIAL PLANNING

It is required that all principal investigators plan, allocate and distribute their expenditures in a manner which will provide for reasonable completion of their project within the financial limits of the award. Principal investigators must ensure eligibility of all expenses in accordance with the rules and regulations of the sponsor, and plan for contingencies.

FINANCIAL TRANSACTIONS

The principal investigator initiates and approves all requests for commitments and transactions for supplies, services, and enumeration, complying with UNBC policies and procedures.

FINANCIAL MONITORING

The principal investigator ensures constant supervision and monitoring of the funds by reviewing the monthly accounting statements provided by Research Accounting and identifying and reporting any discrepancies, errors and inconsistencies to Research Accounting.

Please see the <u>Pre-Award Administration</u> section of this guide for Research Accounting contact information.

FINANCIAL REPORTING

The principal investigator ensures that all financial reports prepared by Research Accounting, as required by the sponsor, are carefully reviewed and approved for submission in a timely manner.

OVER-EXPENDITURES

Principal investigators are accountable and responsible for all deficits resulting from overexpenditures, expenses deemed ineligible by the sponsor or for failure of the principal investigator to comply with the rules and regulations of the sponsor.

POLICIES AND PROCEDURES

Principal investigators must know, understand and apply all applicable policies and procedures of UNBC and of the sponsor. Where there is a difference between the policies of UNBC and the sponsor, the more stringent requirement will be followed.

RESPONSIBLE CONDUCT OF RESEARCH

Principal investigators are responsible for adhering to UNBC's policies on the responsible conduct of research, including the <u>UNBC Integrity in Research and Scholarship</u> policy. Responsible conduct of research involves:

- completing the <u>CITI RCR online training program</u> (see <u>UNBC RCR webpage</u> for access instructions)
- doing the work, monitoring, and controlling the progress of the project in a professional manner;
- ensuring compliance with <u>UNBC policies and procedures;</u>
- ensuring compliance with <u>UNBC Faculty Association Collective Agreement</u> (Article 29);
- ensuring compliance with the sponsor's rules and regulations and contractual terms and conditions;
- ensuring that all scientific and technical discussions with, and reporting to, the sponsor are conducted in a timely manner; and
- supervising their support staff and students, in accordance with UNBC's policies and procedures, including the HR document titled *Research Personnel Recruitment Guide* (under revision).

MATTERS WITH SPONSORS

The principal investigator is responsible for all interactions with the sponsor related to the technical aspects of the research project. The principal investigator must inform and provide any correspondence/documentation to the ORI, for all matters related to any changes to the research project.

Only a duly authorized officer of UNBC is **authorized** to sign applications, proposals, contracts, or contract amendments on behalf of UNBC. After review and approval by Research Accounting, financial statements, reports and invoices are to be submitted as directed by the sponsors.

RESEARCH PERSONNEL

Hiring and employment of personnel is subject to a number of policies that govern his or her treatment. Grant holders – as supervisors – are responsible for being aware of and following these policies including the <u>Academic Services Positions</u>, and <u>Statement of Principles on the</u> <u>Treatment of Postdoctoral Fellows</u>. These policies are found at: <u>https://www2.unbc.ca/policy</u>.

Additional guidelines related to the hiring of research support personnel can be found on UNBC's <u>HR website</u> and the ORI document titled Research Personnel Recruitment Guide (under revision).

BUDGETING FOR SALARY AND BENEFITS

Researchers should review the guidelines set out in the "Use of Grant Funds" section of the *Tri-Agency Financial Administration Guide* found on the NSERC website: <u>https://www.nserc-crsng.gc.ca/InterAgency-Interorganismes/TAFA-AFTO/index_eng.asp</u>

If the funding agency does not have guidelines or regulations regarding compensation, the rate of pay is negotiated with the student/non-student on an individual basis, but must fall within UNBC's <u>HR guidelines</u>.

Benefits will vary with the personnel category, whether the person will be working full or parttime, and the anticipated term of employment.

Please contact HR as listed in the <u>Pre-Award Administration Contact</u> section above for further clarification, or for more information and forms.

Website: https://www2.unbc.ca/human-resources/employee-recruitment

INTELLECTUAL PROPERTY

The Director, Office of Research and Innovation would be happy to assist with finding community and industrial partners for any researcher at any stage of research. The ORI likes to identify research leading to technologies with commercial potential in the earliest stages, when possible, in order to give the best services to researchers.

To view UNBC's *Intellectual Property* policy, please visit: <u>https://www2.unbc.ca/policy</u>

Commercialization of Intellectual Property

Recognizing the unique role of universities as public institutions of higher learning with a mandate to produce new knowledge, UNBC strives to produce benefits to society by publicising research findings and, where appropriate, encouraging the application of research results in tangible ways which may include commercial activities.

The Director, Office of Research and Innovation works with the creators of IP to determine the appropriate path for commercialization based on the IP and the abilities and desires of the creator. Possibilities include sale or licensing of the IP and building a company around the IP.

The Director, Office of Research and Innovation encourages the disposition of IP in ways which assure maximum benefit to the creators, UNBC, and society-at-large.

For methods of preserving IP with respect to the federal IP guidelines, please visit the Canadian Intellectual Property Office:

Website: <u>www.cipo.ic.gc.ca</u> Email: <u>cipo.contact@ic.gc.ca</u> Phone: <u>1-866-997-1936</u>

To learn more, please visit Community & Industry Partnerships at <u>https://www2.unbc.ca/research</u>.

With any other queries, please contact the Director, Office of Research and Innovation.

Please see the <u>Pre-Award Administration Contacts</u> section of this guide for full contact information.

APPENDICES

Appendix A: Policies and Procedures

The following is a list of research-related policies and procedures that exist at UNBC:

- Academic Services Positions
- Adjunct Faculty
- Animal Care and Use
- Appointment of Adjunct Faculty at UNBC
- Carry Forward from University Research Operating Contributions to Canada Research Chairs
- Centres and Research Institutes
- Conflict of Interest
- Equipment Maintenance Repairs in the Laboratory Building
- First Aid
- General Research
- General Research Ethics
- Hazardous Waste Identification & Reporting
- Incident/Accident Reporting & Investigation
- Indirect Costs and Overhead for Research and for Instructional Services Surpluses
- Intellectual Property
- Occupational Health and Safety
- Protective Clothing & Equipment
- Radionuclides & Radiation Hazard
- Research Grant in Lieu of Salary
- Research Involving Human Participants
- Research Vehicle Parking
- Software Acquisitions
- Software Licensing
- Statement of Principles on the Treatment of Post-Doctoral Fellows
- Visiting Scholars and Guest Speakers

Of notable importance is UNBC's "General Research" policy. It governs all research and researchrelated activities conducted under the aegis of UNBC. Please see <u>https://www2.unbc.ca/policy</u> for details.

Appendix B: Research Requiring Certification

UNBC is responsible for ensuring that research is carried out in compliance with the guidelines of agencies, institutions, and foundations. All federally-funded research must abide by the Responsible Conduct of Research Guidelines developed by the Tri-council. Research that involves human participants must be conducted in accordance with the ethical principles and articles of the *Tri-Council Policy Statement: Ethical Conduct for Research Involving Humans (TCPS2 2018)*, and the UNBC policy *UNBC Ethics Review of Research Involving Human Participants*.

UNBC has committees to review research while ensuring compliance with ethical guidelines. These committees are the Research Ethics Board (REB), the Animal Care and Use Committee (ACUC), and the Laboratory & Field Safety Committee (LFSC).

It is recommended that all investigators apply for the appropriate UNBC approval either prior to, or immediately after receiving funding, to ensure that all funds are released in a timely manner.

Please see the section titled <u>Pre-Award Administration Contacts</u> in this guide for any unspecified contact information for the following.

RESEARCH ETHICS BOARD

The Research Ethics Board (REB) is responsible for ensuring university-wide understanding of, and compliance with, all applicable external and internal requirements. Prior to commencement of research and teaching activities involving the use of human participants, the REB must review and approve the activities.

Researchers must be aware that ethical certification is only valid for 12 months. If the research is ongoing, ethical certification must be renewed after expiry.

Please see the <u>website</u> for more information, including the REB Membership, Terms of Reference Policy, Policies and Procedures on Research Involving Human Participants, REB Submission Deadline and Meeting Schedule, and necessary forms; the REB Terms of Reference Policy includes its internal guidelines and approval process.

EDUCATION

The Interagency Advisory Panel on Research Ethics has developed an Online Tutorial, TCPS2: <u>Course on Research Ethics (CORE)</u>. It is recommended that the tutorial be completed prior to applying for research ethics review. It was designed to support the Canadian research community's implementation of TCPS2, and to provide a common understanding.

For more information on TCPS2, please visit: <u>https://ethics.gc.ca/eng/policy-politique_tcps2-eptc2_2018.html</u>.

The Canadian Institutes for Health Research have a number of publications on ethics such as Best Practices for Protecting Privacy in Health Research and Aboriginal Ethics Policy. For more information about ethics at CIHR, visit the <u>CIHR site</u>, including the Online Research Ethics Tutorial, Aboriginal Ethics Policy, and Ethics at CIHR.

NORTHERN HEALTH AUTHORITY

If you are conducting research in conjunction with Northern Health, please contact their Research Review Committee for information at: <u>researchcommittee@northernhealth.ca</u> on their review processes or visit their webpage with the link below. You are also required to complete the <u>Northern Health Authority Operational Approval</u> form and attach your UNBC REB application, which can also be found below.

Please see the website below for more information, including the Northern Health Authority's Application Guidelines & Deadlines, and Application for Research Approval.

Website:<u>https://www.northernhealth.ca/for-health-professionals/research/nh-research-review-committee</u>

HUMAN PARTICIPANT HARMONIZED RESEARCH ETHICS REVIEW

If your research involves human participants, and is being conducted with research collaborators or site access at other research institutions and/or multiple health authorities within British Columbia, it may be possible to complete a single multi-jurisdictional application. Please reference the list of network members at Research Ethics BC. The application and review process is supported on the Provincial Research Ethics Platform (PREP) which is hosted on the Research Information System (RISe) at UBC. Please visit <u>ResearchEthicsBC</u> for further information and resources. If you have questions, contact the Research Ethics Officer at the Office of Research and Innovation.

RESEARCH INVOLVING ANIMALS

Researchers who will be working with animals, and those individuals working in their labs (students, research assistants, etc.), are required to complete a Medical History Questionnaire and the Animal Training Certification Course. This includes researchers and others who may have previous experience.

The Medical History Questionnaire must be completed and submitted to the NHSRF Coordinator/Biological Safety Officer before any work with animals can be started. The form can be retrieved from the <u>website</u>.

For information about the Animal Training Certification Course, or to register for the program, please contact the NHSRF Coordinator/Biological Safety Officer.

The Animal Care and Use Committee (ACUC), is responsible for ensuring university-wide understanding of, and compliance with, all applicable external and internal requirements. Prior to commencement of research and teaching activities involving the use of animals, the ACUC must review and approve the activities.

Any research or teaching conducted under the auspices of UNBC involving the use of animals (including fish and invertebrates) must conform to the UNBC policy on *Animal Care and Use* and must have the prior approval of the UNBC ACUC.

Please see the <u>website</u> for more information, including the policy on Animal Care & Use, ACUC Membership, Terms of Reference, and the required forms; the Terms of Reference includes ACUC's internal guidelines and approval process.

RESEARCH INVOLVING BIOHAZARDOUS MATERIALS

At this time, UNBC is only registered to work with substances/toxins classified as a Risk Group 1 or 2. Before any researcher, student or employee can work with a Risk Group 2 substance/toxin, they are required to complete Biosafety Level 2 training. Please contact the UNBC's Biological Safety Officer to register. This training will be required before you can apply for any permits or purchase any biohazardous materials.

Any protocol using biohazardous substances/toxins will be required to be reviewed and approved by the Laboratory Safety Committee prior to any use.

Research involving any biohazardous material requires special permits. These include bacteria, viruses, plasmids, cell-lines, recombinant DNA, and/or primate body fluids, including blood. Researchers who are proposing to use biohazardous materials or notifiable biological substances must obtain a permit before purchasing these items or commencing laboratory work. An application form for a permit can be obtained from UNBC's Biological Safety Officer. The Biological Safety Officer can also provide a copy of the UNBC Laboratory Biological Safety Manual, as well as information regarding the procedure that will occur following submission of a completed application form.

The Laboratory and Field Safety Committee (LFSC) is responsible for all matters pertaining to biosafety, x-ray, laser, chemical and general laboratory safety at UNBC and is mandated to fulfill the responsibilities of a Research Institution as described in the most current version of the *Government of Canada, Canadian Biosafety Standards and Guidelines (1st edition, 2013)* and the Ministry of Labour. Health and safety at UNBC abides by procedures described in the *Government of Canada, Canadian Biosafety Standards and Guidelines and the Occupational Health and Safety Act.*

The Laboratory and Field Safety Committee reports to the Risk and Safety Management Office. For more information about safety in biology or chemistry labs, please refer to the Risk and Safety Management Office members. Please see the <u>website</u> for more information on Lab and Field Safety and the Risk and Safety Management Office.

RESEARCH INVOLVING CONTROLLED GOODS

Some research undertaken at UNBC may be subject to export controls administered by Public Services and Procurement Canada, particularly in the Faculties of Science and Environmental Engineering.

The funding agency does not take any responsibility for UNBC's compliance, including the actions of applicants. Applicants and their associated institutions bear direct responsibility for ensuring compliance with the laws and regulations regarding controlled goods.

External contact: Public Services and Procurement Canada Controlled Goods Website: <u>https://www.tpsgc-pwgsc.gc.ca/pmc-cgp/index-eng.html</u>

RESEARCH INVOLVING CONTROLLED SUBSTANCES

UNBC works in collaboration with Health Canada, to ensure that controlled substances are handled effectively and remain in legal distribution channels; and that valid commercial, medical and scientific activities are not interfered with.

Research organizations require licensing and permits to obtain, make, store or transport controlled substances. Some research undertaken at UNBC may be subject to import and export controls administered by Health Canada. All legislative documents related to controlled substances can be found on the Health Canada website below.

| External contact: | Health Canada |
|-------------------|--|
| | Office of Controlled Substances |
| | Phone: 613-954-2177 |
| | Email: <u>OCS-BSC@hc-sc.gc.ca</u> |
| | Website: https://www.hc-sc.gc.ca/hc-ps/substancontrol/substan/index- |
| | eng.php |

RESEARCH INVOLVING NEW SUBSTANCES

Any researcher who intends to import or manufacture a "new substance" in Canada, whether organic or inorganic, animate (live) or inanimate (lifeless), is required to submit a new substance notification (NSN) package to Environment Canada's New Substance Division prior to importing or manufacturing. Otherwise, all substances acquired by UNBC must be located on Canada's Domestic Substances List.

External contact: Environment Canada, New Substances Division Phone: 1-800-567-1999 Email: substances@ec.gc.ca Website: https://www.ec.gc.ca/subsnouvelles-newsubs/

RESEARCH INVOLVING TRANSPORTATION OF DANGEROUS GOODS

Any researcher who will be transporting dangerous goods or controlled products off the UNBC campus may fall under the *Transportation of Dangerous Goods Act*. This includes, but is not limited to, the transportation of dangerous goods (TDG) into or out of the field, community or other institutions by air, rail or road. If you ship, receive or transport dangerous goods, you must be trained and carry a valid TDG certification card, or work under the direct supervision of someone who is trained. To receive TDG training, please send an email to <u>safety@unbc.ca</u> for further instructions. Please refer to the *British Columbia Transportation of Dangerous Goods Act* (at: <u>https://www.bclaws.ca/civix/document/id/complete/statreg/10 203 85</u>) and <u>Federal Transportation of Dangerous Goods Act</u>, *1992* (listed below) for further information on this legislation.

There are exemptions to the TDG regulations if the quantity of goods to be shipped is below the exemption limit. To check the limits for each dangerous good, contact UNBC as set out below or view the following Government of Canada website.

| External contact: | Public Works and Government Services Canada Transportation of Dangerous Goods (CANUTEC) Phone: 613-992-4624 (call collect) Email: <u>canutec@tc.gc.ca</u> or <u>tdg-tmd@tc.gc.ca</u> Website: <u>https://www.tpsgc-pwgsc.gc.ca/comm/index-eng.html</u> |
|-------------------|--|
| Internal contact: | Laboratory & Field Safety Lydia Troc, Health and Safety Manager Phone: 250-960-5530 Email: <u>Lydia.troc@unbc.ca</u> Website: <u>https://www2.unbc.ca/safety/lab-safety</u> |

RESEARCH REQUIRING ENVIRONMENTAL ASSESSMENTS

In Canada, environmental assessments (EA)s are triggered whenever a federal department or agency, such as NSERC, proposes a project, provides financial assistance, transfers control of federal land to enable a project, or provides a license, permit or an approval as listed in the *Law List Regulations* to enable a project. Any research project, which involves any of the activities which trigger an EA, will be reviewed for environmental sensitivity and identify any potential liability for the institution.

All NSERC applications are reviewed by NSERC during the peer review process for compliance to the *Canadian Environmental Assessment Act*. Individual researchers are required to provide more specific environmental information in Form 101 (Appendix A). Please see NSERC's *Guidelines on Environmental Review and Assessment* at the website below.

External contact: Natural Sciences and Engineering Research Council of Canada Environmental Assessment Unit Phone: 613-995-8079 Email: <u>enviro.assess@nserc-crsng.gc.ca</u> Website: <u>https://www.nserc-crsng.gc.ca/NSERC-CRSNG/policies-politiques/enviroassess-enviroeval_eng.asp</u>

Appendix C: Frequently Used Acronyms

| ACUC | Animal Care and Use Committee |
|------------|---|
| BC | British Columbia |
| CDI | Community Development Institute |
| CIHR | Canadian Institutes of Health Research |
| CRC | Canada Research Chair |
| CSCM | Contracts and Supply Chain Management |
| CUPE | Canadian Union of Public Employees |
| EA | Environmental Assessment |
| HR | Human Resources |
| HRI | Health Research Institute |
| IT | Information Technology |
| IP | Intellectual Property |
| LFSC | Laboratory & Field Safety Committee |
| MOU | Memorandum of Understanding |
| NRESi | Natural Resources and Environmental Studies Institute |
| NSERC | Natural Sciences and Engineering Research Council of Canada |
| NSN | New Substance Notification |
| ORI | Office of Research and Innovation |
| PDF | Post-Doctoral Fellow |
| PICS | Pacific Institute for Climate Solutions |
| PIO | Partnership and Innovation Officer |
| PO | Purchase Order |
| REB | Research Ethics Board |
| RFP | Request for Proposal |
| RPO | Research Project Officer |
| SSHRC | Social Sciences and Humanities Research Council of Canada |
| TCPS2 | 2 nd edition of Tri-Council Policy Statement: Ethical Conduct for Research |
| | Involving Humans |
| TDG | Transportation of Dangerous Goods |
| Tri-Agency | Three agencies: Canadian Institutes of Health Research (CIHR); the Natural |
| | Sciences and Engineering Research Council of Canada (NSERC), and the Social |
| | Sciences and Humanities Research Council of Canada (SSHRC) |
| UNBC | University of Northern British Columbia |
| VPR | Vice President, Research and Innovation |