



Research News

TRU Research Community,

It is difficult to believe that September is already behind us, and as you will see below it was an exceptionally productive month for our research faculty and students. The fall semester is now in full swing, with various research events and activities scheduled, so please take a moment and add these to your calendar. This fall has also seen staffing changes. We wish to acknowledge the dedication of **Emily Mullen**, our graduate studies and research coordinator. In her role, Emily worked closely with the graduate program coordinators and members of the graduate studies committee and senate research committees to coordinate the many adjudications for faculty and student awards. She played a pivotal role in authoring new online thesis defence guidelines, and personally ensured students were able to defend in the hectic days following campus closure. Emily worked closely with TRU's Graduate Research Mentors to foster the growing culture of graduate studies, and helped coordinate events such as the virtual graduate student orientation and the virtual 3MT competition. Emily's presence in the Office of Research and Graduate Studies will be greatly missed.

COVID-19 research impacts

The Research Office is committed to providing up-to-date information designed to facilitate the continuation of faculty and student research during this global pandemic. [This website](#) will be updated regularly, and includes links to Tri-Agency pandemic response, information about research continuity planning, guidelines for research teams, travel awards, funding opportunities, and more. We advise you bookmark this page and check back regularly, as this situation is rapidly changing.

Remote thesis defences continue

Remote thesis defences are continuing under the leadership of the individual programs according to the new Guidelines on Thesis Defences. Specific meeting connection instructions will be provided in announcements that are distributed to the TRU community.

Congratulations:

- **Serena Reves**, Master of Education, "Reconciliatory action research: Building foundations of ally ship behaviour in a Science 10 classroom."

Research initiatives

Tap into Research: Looking for presenters

We are thrilled with the response to our virtual Tap into Research series, and are currently searching for presenters for the months of November and December. If you are interested in working with us to share your knowledge with the community, contact [Danna Bach](#).



From the archive:

- **A glimpse into graduate research**, featuring Aramide Taiwo, Ted Morton & Kyley Drach, (premiered Oct. 7)

Upcoming:

- **Carol Rees**, **Teaching science in a pandemic**, Oct. 21, 7 pm.

New Researcher Orientation

When: Oct. 30, 9-10 am

Where: Microsoft Teams

Dr. Christine Bovis-Crossen, Provost & Vice-President Academic and Research, and Dr. Will Garrett-Petts, Associate Vice-President Research and Graduate Studies, cordially invite all new faculty researchers to this orientation and virtual breakfast. This informal meeting will provide new and recently hired faculty members the opportunity to meet the university's research leadership team, and to hear about new research initiatives.

[Read more](#)

Research News

Research equips teachers for pandemic challenges

TRU's Carol Rees is spearheading a federally funded research partnership with the Kamloops-Thompson School District that seeks to improve learning opportunities for science students during a pandemic.



[Read more](#)

3MT winner takes a critical look at mountain biking

Find out how Ted Morton, Master of Science in Environmental Science, won first place in the Three Minute Thesis competition.



[Read more](#)

Share your expertise

As you can see below, media is reaching out to TRU routinely, searching for experts to speak on a variety of issues. Please make yourself easy to find by joining the [Experts List](#). For more information, please reach out to [Danna Bach](#), or take a moment and [simply register online](#).

Research in the media

CFAX 1070 | Greater Victoria air quality index 'very high risk' due to wildfire smoke

Sept. 11 — Dr. Michael Mehta, professor of geography and environmental studies, is interviewed about the air quality in Victoria and the health impacts associated with wildfire smoke.

[Read more](#)

[Radio NL | CBD and nitric oxide for COVID-19 prevention](#)

Sept. 14 — Dr. John Church, BC Regional Innovation Chair, talks to NL's Brett Mineer about his NSERC-funded collaborative research project with Dr. Kingsley Donkor and Dr. Joanna Urban.

[The Hill Times | Indigenous visions for Canadian post-secondary institutions: past, present, and future](#)

Sept. 16 — Dr. Shelly Johnson, Canada Research Chair, wrote an op-ed about the wary relationship Indigenous peoples have with Canada's post-secondary institutions, and how to move forward.

** Note, this article is accessible by subscription only*

[Read more](#)

[Victoria News | Patrick brothers who shaped modern hockey also tried, but failed, to remove violence](#)

Sept. 20 — Dr. Taylor McKee, a sessional instructor in TRU's Faculty of Arts, discusses his PhD research, which explores the historical attempts to reduce violence in hockey.

[Read more](#)

[CFJC Today | Kamloops politicians face B.C. election unlike any other](#)

Sept. 21 — Dr. Robert Hanlon, associate professor of political science, provides his insights into the upcoming provincial election.

[Read more](#)

[The Tyee | BC Liberals propose an \\$8-billion PST tax cut](#)

Sept. 28 — Dr. Joel Wood, associate professor of economics, speaks with The Tyee about the BC Liberals' proposed PST cut and whether it would help sectors that have suffered the biggest losses during the pandemic.

[Read more](#)

CFJC Today | TRU political science professor says PST proposal will gain Liberals votes, wonders how sustainable it is

Sept. 28 — Dr. Hanlon discusses the BC Liberals' proposed PST cut.

[Read more](#)

CFOX | Wildfire smoke has returned

Sept. 30 — Reporter Adam Stirling spoke with Dr. Michael Mehta about the wildfire smoke that blanketed BC for several days in September, and how people can keep themselves safe.

[Read more](#)

CTV Edmonton | 'It hurts:' Workers grapple with the mental impacts of Alberta's recession

Oct. 5 — TRU economics professor Dr. Ehsan Latif provides his insights into the mental health impacts of pandemic-related job losses. This story was originally published by the St. Albert Gazette, and republished across several news outlets.

[Read more](#)

Global News | New made-in-the-Shuswap app aims to democratize access to water quality data for everyone

Oct. 8 — Trevor Andrew, a recent graduate of the Water and Wastewater Technology program, and a member of the Adams Lake Indian Band, developed a new app that aims to improve access to information about water quality to Indigenous communities.

[Read more](#)

Funding news

Equity, diversity and inclusion in the research funding system

In her [latest message to the health research community](#), Dr. Tammy Clifford, Vice-President, CIHR Research Programs, noted the disproportionate impact of COVID-19 on those marginalized by race, gender, age, and socio-economic status, and highlighted recent evidence that demonstrates the pandemic has worsened inequalities for underrepresented and disadvantaged groups in the research system, including woman and individuals with caregiving responsibilities. As such, CIHR has reaffirmed its commitment to fostering a more equitable, diverse, and inclusive research funding system, and has identified protocols for actioning this commitment.

Safeguard your Research

In coordination with federal government partners and university organizations, Canada's three federal granting agencies and the Canada Foundation for Innovation (CFI) provide tools for the academic community to self-evaluate and, when necessary, take actions to mitigate any security, safety, economic, or geopolitical risks associated with their research, their research partnerships and their international travel. These resources are provided in the [Safeguarding Your Research](#) portal.

COVID-19 Research Impacts

For the most up-to-date- news on Tri-Agency response to COVID-19, please visit the following:

- [COVID-19 Impacts on SSHRC's Policies and Programs](#)
- [NSERC program information in relation to COVID-19](#)
- [CIHR: Coronavirus disease \(COVID-19\)](#)

Funding opportunities (external)

A new calendar for [COVID related research grants](#) has been created, and features sponsored research opportunities on the novel coronavirus.

- The internal deadline for all applications is **two weeks prior** to the listed deadline. This allows time to receive critical review, obtain support letters and appropriate institutional approval. Please contact [Anita Sharma](#) or [Megan Prins](#) at the earliest opportunity to receive extensive grant development support.

Compute Canada

Resource Allocation Competitions

Deadline: Nov. 5

The Resource Allocation Competitions (RAC) are designed for research groups that require more compute, storage or cloud resources than are provided within regular Compute Canada account allocations. It is comprised of two competitions:

1. The Resources for Research Groups (RRG) for those requiring compute and storage; and
 2. The Research Platforms & Portals (RPP) for those requiring cloud resources to create digital platforms, tools and applications customized for a specific community within a discipline, ex. Canadian literature of the 20th century.
- Resource Allocation Competitions (RAC) is to request storage and compute resources beyond what can be obtained via the [Rapid Access Service](#).

** If you are applying for the first time to the RAC, we encourage you to consult with Compute Canada prior to submitting your application. Consultations should happen **before Oct. 31**. We ask that you also invite a RO representative to be present to enable institutional support.*

Alzheimer Society

Research Program (ASRP) competition

Deadline: Nov. 6

Award amount: \$100,000- \$200,000

There are two funding streams for faculty:

New Investigator Operating Grants are designed to help launch the careers of outstanding researchers who are within the first 4 years of their initial academic appointment.

Proof of Concept Grants are designed to fund established researchers in conducting innovative, high-risk and high-reward approaches to dementia research. Please do not submit existing hypotheses.

Canada Mortgage and Housing Cooperation

Housing Supply Challenge - Round 1: Data Driven – Solutions for Informed Decision Making

Deadline: Jan. 20

Award amount: Up to \$100,000

The Housing Supply Challenge (HSC) invites citizens, stakeholders, and experts from across Canada to propose innovative solutions to the barriers that

limit the creation of new housing. **Round 1 Challenge: The Data Driven round** invites applicants to submit data solutions or methodologies that improve the collection, sharing, analysis and integration, and/or presentation of data. The broad definition allows participants to determine the solution that best fits the needs of the identified problem. We want decision makers to use the solutions to provide and maintain needed housing supply. Solutions should help government agencies, policy makers, private or not-for-profit organizations, etc. have a real impact on housing supply at a macro or a local level.

Objectives of this round:

- Identify and cultivate data solutions that positively impact housing supply that is affordable and meets people's needs.
- Provide funding and support to implement and scale the most promising data solutions that target housing supply decision makers.
- Create long-term partnerships to connect data expertise, housing expertise, and the communities that can enable housing supply initiatives.
- Create a culture of trust and openness in Canada to encourage the accessibility of housing data for everyone that might benefit from it.

CIHR

Indigenous COVID-19 Rapid Research Funding

Deadlines: Nov. 10 (registration); Dec. 8 (full application)

Award amounts: \$100,000 - \$200,000

This opportunity provides funding for Indigenous communities, Indigenous organizations, and researchers of Indigenous ancestry (or researchers who provide evidence of having meaningful and culturally safe involvement with Indigenous Peoples) in Canada who are responding to the unique health needs of Indigenous peoples as they relate to the COVID-19 pandemic. More specifically, this opportunity will support strengths-based, solutions-focused research that is bold, innovative, community-led, and that addresses the immediate, intermediate, and/or long-term consequences of COVID-19 and/or informs future preparedness. Research supported by this funding opportunity must include a knowledge translation and knowledge mobilization component to ensure that Indigenous communities, researchers and decision-makers can use results.

Spring and Fall Project Grant:

Deadlines: March 4 (spring registration); March 1 (full registration).

This program is designed to capture ideas with the greatest potential for important advances in fundamental or applied health-related knowledge, health care, health systems, and/or health outcomes. The best ideas may stem from new, incremental, innovative, and/or high-risk lines of inquiry or knowledge translation approaches. Please also see [Priority Announcements](#) that offer additional sources of funding for highly rated applications.

[Team Grant: Food Security and Climate Change in the Canadian North](#)

DEADLINE CHANGE: LOI: Dec. 31 (successful LOIs will be awarded \$25,000 to develop a full application)

Award amount: Up to 1.5 million over 4 years.

The goal of this initiative is to support multidisciplinary teams of researchers, knowledge users and/or partners to work together to address food security and climate change in the North.

SSHRC

[Knowledge Synthesis Grants – Mobility and Public Transit](#)

Deadline: Dec. 17

Award amount: \$30,000

SSHRC, in partnership with Infrastructure Canada, has launched this opportunity to assess the state of research knowledge on the topic of “[Mobility and Public Transit](#).” Through this partnership, SSHRC’s [Imagining Canada’s Future](#) initiative seeks to strengthen connections between social sciences and humanities research and society, and to help inform decision-making that contributes to the well-being and prosperity of Canadians.

[Connection Grants](#)

Deadlines: Nov. 1, Feb. 1

Award amount: \$7,000 to \$25,000 (events); up to \$50,000 (outreach activities)

Connection grants support events and outreach activities geared toward short-term, targeted knowledge mobilization initiatives. Events and outreach activities funded by a Connection Grant may often serve as a first step toward more comprehensive and longer-term projects potentially eligible for funding through other SSHRC funding opportunities listed in SSHRC’s Funding search tool.

[SSHRC Partnership Development Grants](#)

Deadline: Nov 15

Value: \$75,000 to \$200,000

These grants provide support to teams/partnerships to: i) develop research and related activities in the social sciences and humanities, including knowledge mobilization and the meaningful involvement of students and new scholars, by fostering new partnerships for research and related activities involving existing and/or potential partners; or ii) design and test new partnership approaches for research and/or related activities that may result in best practices or models that either can be adapted by others or have the potential to be scaled up to a regional, national or international level.

Partnership Engage Grants

Deadlines: Dec. 15

Award amount: \$7,000 to \$25,000

These grants provide short-term and timely support for partnered research activities that will inform decision-making at a single partner organization from the public, private or not-for-profit sector. The partnerships supported through these grants respond to immediate needs and time constraints facing organizations in non-academic sectors.

SSHRC Insight Development Grants

Deadline: Feb 3 (TBA)

Value: \$7,000 to \$75,000/two years

Insight Development Grants (IDG) enable the development of new research questions, as well as experimentation with new methods, theoretical approaches and/or ideas. IDGs foster research in its initial stages, but are not intended to support large-scale initiatives. Funding is available to both emerging and established scholars and 50% of the budget is reserved for emerging scholars.

NSERC

NSERC Idea to Innovation (I2I) Grants

Deadlines: Sept 28; Jan. 6

Award value: \$15,000-\$350,000*

**Applicants must contact [Lincoln Smith](#) to discuss partnerships, IP, and research agreements prior to applying for this grant*

The Idea to Innovation (I2I) grants will accelerate the pre-competitive development of promising technology originating from the university and college sector and promote its transfer to a new or established Canadian company. The I2I grants provide funding to college and university faculty members to support

research and development projects with recognized technology transfer potential. This is achieved through defined phases by providing crucial assistance in the early stages of technology validation and market connection.

[Alliance Grants](#)

Deadlines: ongoing

NSERC is pleased to announce the opening of the next phases of [Alliance grants](#). Alliance grants are now open for [Option 1](#) applications requesting over \$20,000 annually from NSERC, and [Option 2](#) applications requesting support for up to 90% or 100% of the costs of the project are now open.

Alliance grants encourage university researchers to collaborate with partner organizations, which can be from the private, public or not-for-profit sectors.

Please also see [slide deck](#) from NSERC Research and Innovation

Development Officer, Pam Giberson's presentation at TRU. And an Alliance Grant application "[Top Tips](#)" document.

Government of Canada

Canadian Space Agency - [Lunar Exploration Accelerator Program \(Leap\)](#)

Deadline: [Request for Proposals-Letter of Intent \(rolling to March, 2022\)](#)

The Canadian Space Agency is preparing Canada's space community and collaborating sectors, including Canadian companies, universities, research institutions, and other organizations, for potential roles in the long-term exploration of the Moon. The Lunar Exploration Accelerator Program (LEAP) was created to provide a wide range of opportunities for Canadian science and technology activities in lunar orbit, on the Moon's surface, and beyond. LEAP is looking to [foster innovation in areas of strength for Canada](#), like artificial intelligence, robotics, science and health.

Provincial Government

[The BC Parks Living Lab for Climate Change and Conservation Program](#)

Deadline: Oct. 25

Award value: \$10,000 - \$35,000

This program promotes B.C.'s protected areas as places to learn about the effects of climate change, how to mitigate and manage for these effects, and how to share this information among and between academics and practitioners. B.C.'s protected areas are less developed than much of the rest of the province, so parks serve as a "living lab," and can help us understand the impact of climate change on the natural world. Climate-informed conservation research in

protected areas can also reveal areas that are critical to connectivity within and adjacent to the protected areas system which in turn can inform management decisions. Applicants are encouraged to consider the Living Lab Program's [goals](#) and [priority projects and research themes](#) in their application.

Foundations

[Habitat Conservation Trust Foundation: Enhancement and Restoration Grants](#)

Deadline: Nov. 6

Award amount: \$10,000 - \$100,000, annually.

These grants are provided to projects that:

- Focus on native freshwater fish, wildlife and their habitats;
- Have the potential to achieve a significant conservation outcome;
- Align with our purposes as laid out in the Wildlife Act.

One of HCTF priorities is to support habitat enhancement and restoration, therefore proposals that involve on-the-ground habitat enhancement and/or restoration activities are strongly encouraged.

[Habitat Conservation Trust Foundation: Stewardship Grants](#)

Deadline: Nov. 6

Award amount: \$10,000 - \$80,000, annually (\$30,000 average)

HCTF recognizes the importance of environmental stewardship and invests in projects that create stewards. Stewards include individuals, practitioners, and community organizations who take responsibility for promoting, monitoring, conserving, and restoring ecosystems to ultimately result in enduring conservation outcomes for fish and wildlife and their habitats. Proposed projects must align with our purposes as laid out in the Wildlife Act.

[Max Bell Foundation: Project Grants and Development Grants](#)

Deadline: Ongoing

Award amount: \$10,000-\$200,000/ 1-3 years

Project Grants support clearly defined activities designed to achieve a specific objective that aligns with the Foundation's mission and criteria and that seek to support projects with a high likelihood of informing public policy and practice. Current program areas include: Health & Wellness; Education; the Environment.

Development Grants support organizations who wish to undertake short-term (typically 4 month) work that will better position them to succeed with larger projects (e.g., environmental scanning; background research; project planning;

proposal development etc.). Development grants are described in more detail [here](#).

[Michael Smith Foundation for Health Research: Convening & Collaborating \(C2\), and Reach](#)

NEW Deadline: Sept. 28

Award amount: Up to \$15,000

C2 awards bring together researchers and research users to co-develop research aligned with BC's health system priorities. Reach awards bring together researchers and research users to support the dissemination of research evidence, within the context of related knowledge, and increase its potential impact. Together, teams co-develop events, activities, and/or tools, so they can share research findings and evidence with audiences who can directly use the knowledge.

Fellowships

[Canadian Blood Services: BloodTechNet Award Program](#)

Deadline: Nov. 15

Award amount: \$50,000

Through the BloodTechNet award, Canadian Blood Services supports the development of innovative educational projects that network the Transfusion, Cellular Therapy and Transplantation communities in Canada. These projects deliver educational tools and resources that support the development of skills, knowledge and expertise of the health professionals in this network.

Funding opportunities (internal)

[Research Training Recognition Fund](#)

Deadline: Oct. 15

Those regular faculty receiving or currently holding multi-year Tri-Agency research grants are eligible to receive a reallocation of workload (e.g., from 5 courses to 4 courses) to facilitate their direct involvement in the enhanced research training of undergraduate and graduate students. The RTRF is an ongoing fund with a minimum of \$140,000 annually available. Eligibility Criteria: Must hold a multi-year Tri-Agency research grant (as Principal Investigator); must make a commitment to significant student research training.

[The Thompson Rivers University Internal Research Fund](#)

Deadline: Jan. 15 annually

Award amount: \$3,000 - \$5,000.

A joint initiative of the Research and Graduate Studies office and the Office of the Provost and Vice-President Academic, this fund provides a maximum of \$100,000 annually to support research with the principal aim of helping faculty become more competitive for external funding and scaffolding faculty development, especially in terms of tenure and promotion. Completion of an IRF project should significantly widen the applicant's sphere of influence in terms of their research and scholarship. The IRF is a seed fund that is not intended to provide funding for major projects. *Those accepting IRF funding are expected to apply for complementary or future external funding support.*

Please find the Terms of Reference and Application Form in [Romeo](#).

Funding opportunities (students)

[Environmental Science and Natural Resource Science Fellowship Award](#)

Deadline: Nov. 15

Value: \$7,500

The fellowship was generously created by an anonymous donor for the development of two awards; one for Environmental Sciences and one for Natural Resource Sciences. Recipients — either senior undergraduate or graduate students — will be selected based on their scholarly achievements, their commitment to research and their demonstrated potential for future contributions to our understanding of the environment.

[British Columbia Graduate Scholarships](#)

Deadline: Dec. 1

Value: \$15,000/Four awards available

Students enrolled in research intensive and professional programs are encouraged to apply. Awards will be given to domestic students (Canadians or permanent residents) based on academic achievement. Students must be entering their first or second year of full-time on-campus study.

[Canada Graduate Scholarship — Masters \(CGS-M\)](#)

Deadline: Dec. 1 (competition opens in September)

Value: \$17,500 for 12 months, non-renewable

TRU offers four CGS-M entrance awards for domestic students, one each from

the Canadian Institute of Health Research (CIHR) and the Natural Sciences and Engineering Research Council (NSERC), and two from the Social Sciences and Humanities Research Council (SSHRC). These three granting agencies have harmonized the application process. The application must be completed through the [Research Portal](#). It is recommended students begin this process as soon as possible.

Knowledge mobilization

Presentations

Kang, Yong Joo. (2020, June). The Recovery Theorem: Evaluation and implementation strategies for empirical analysis. Paper presented at the Administrative Sciences Association of Canada 2020 Conference.

** This paper was awarded Best Paper in the finance division*

Published books, chapters & articles

Baugh, Bruce. (2020) Hegel and Sartre: The Search for Totality. *The Palgrave Handbook of German Idealism and Existentialism*. 499-521. Palgrave-Macmillan. New York.

Bourque Bearskin, R.L., Kennedy, A., Joseph, C. (2020). Nīpawīstimatowin - “Bearing witness for one another” Editorial. [Special Issue]. *Witness: The Canadian Journal of Critical Nursing Discourse*, 2,1, York University; Toronto Ontario.

Drayton, T., Jaiyeola, A., Hoque, N., Maurer, M., & **Hashim, H.** (2020). *Fast adaptation nonlinear observer for SLAM*

Levia, D. F., Creed, I. F., Hannah, D. M., Nanko, K., Boyer, E. W., **Carlyle-Moses, D.**, . . . Bruen, M. (2020). Homogenization of the terrestrial water cycle. *Nature Geoscience*, 13(10), 656-658. doi:10.1038/s41561-020-0641-y

Martin, B.C., and Honig, B. (2020). Inclusive Management Research: Persons with Disabilities and Self-Employment Activity as an Exemplar. *Journal of Business Ethics*. 166, 553-575.

Matti, H., Caitlin, M., Haverila Kai, C., & Mehak, A. (2020). *Beyond lurking and posting: Segmenting the members of a brand community on the basis of engagement, attitudes and identification* doi:10.1108/JPBM-08-2019-2543

Sanford, R. L., Hawker, K., Wayland, S., & Maple, M. (2020). Workplace exposure to suicide among Australian mental health workers: A mixed-methods study. *International Journal of Mental Health Nursing*, n/doi:10.1111/inm.12783

Sibbald, T., & **Handford, V.** (2020). *Beyond the academic gateway*. Ottawa: University of Ottawa Press.

Sieb, T., Singh, A., Guidos, L., & **Hashim, H.** (2020). *FLC tuned with gravitational search algorithm for nonlinear pose filter*

W. Ejaz, M. Naeem, & S. Zeadally. (2020). *On-demand sensing and wireless power transfer for self-sustainable industrial IoT networks* doi:10.1109/TII.2020.3025510

Waqar, O., Asim Ali, M., Liaqat, M., & Iqbal, A. (2020). On the ergodic capacities of decode-and-forward MIMO relay network with simultaneous wireless information and power transfer. *Transactions on Emerging Telecommunications Technologies*, n/a, e4126. doi:10.1002/ett.4126