

General Faculties Council Research and Scholarship Committee Approved Minutes

Thursday, October 17, 2024, 2:00 p.m. Meeting #77

A167/Zoom

Voting Members

Robert Thompson, Co-Chair
Sheri Madigan, Academic Co-Chair*
Ayan Chanda*
Jessie Dinh
Michael Hill* – arrived during Item 4
Kris Innanen* – arrived during Item 3
Aamir Jamal* – left during Item 4
Daniel McGrath*
Alexandria Poppendorf* – left during Item 4
Shelly Russell-Mayhew*
James Wasmuth

Non-Voting Members

Alyona Belikova Hamid Habibi* Katrina Milaney Cristina Rai*

Secretary

Courtney McVie

Scribe

Elizabeth Sjogren

Regrets

Alberto de Salvatierra Yrjo Koskinen Alex Ramirez-Serrano Raylene Reimer DeBruyn Mary-Jo Romaniuk Rudiger Tscherning Lorraine Venturato

Guests

Alanna Bartolini, Senior Specialist, ITS, Digital Worlds Area of Focus – present for Item 3
Steven Bryant, Academic Lead, Transdisciplinary Scholarship* – present to introduce Item 3
Marina Gavrilova, Academic Co-Lead, Digital Worlds ITS Area of Focus* – present for Item 3
Benedikt Hallgrimsson, Deputy Director at the Alberta Children's Hospital Research Institute and One Child Every Child Precision Health and Wellness and Data Co-Lead – present for Item 4
Mohammad Keyhani, Academic Co-Lead, Digital Worlds ITS Area of Focus – present for Item 3
Lorna Very, Executive Director, Office of the Vice-President (Research)* – present for Item 5
Joanne Weninger, Executive Director, Alberta Children's Hospital Research Institute and One Child Every Child – present for Item 4
Tyler Williamson, Academic Co-Lead, Digital Worlds ITS Area of Focus – present for Item 3

*Attended virtually

Secretary's Note: In accordance with the General Faculties Council (GFC) Bylaws Section 8.2, the motion box and "Carried" denotation serves as the entry in the minutes that the Chair of the meeting declared the motion carried.

The Chair called the meeting to order at 2:11 p.m. without quorum. Quorum was achieved at ~2:30 p.m. during Item 3.

1. Meeting Opening

1.1. Approval of the Agenda

Documentation was circulated with the Agenda.

Moved/Seconded

That the Agenda for the October 17, 2024 Research and Scholarship Committee meeting be approved.

Carried

1.2. Remarks of the Co-Chair and Academic Co-Chair

The Academic Co-Chair welcomed Ayan Chanda, Postdoctoral Association, and James Wasmuth, Faculty of Veterinary Medicine, to their first Research and Scholarship Committee meeting.

The Co-Chair included the following in his remarks:

- It is currently the period for Tri-Council grant applications, a busy time for researchers at the University as between 500-600 grant applications go in over a two-month period. Adding to the intensity of this period are the new externally mandated research security requirements. Efforts were made to make this as administratively smooth as possible, and the process will be reviewed for possible improvements. The research security requirements are straightforward for most projects but can be more complicated for projects that are classified as in sensitive research areas or involving international partnerships.
- The Canada Foundation for Innovation Fund application process is underway. The University's teams to move forward have been identified and they have begun work on their in-depth applications.

2. Approval of the September 19, 2024 Meeting Minutes

Documentation was circulated with the Agenda.

Moved/Seconded

That the Minutes of the Research and Scholarship Committee meeting held on September 19, 2024 be approved.

Carried

3. Institutes for Transdisciplinary Scholarship (ITS) Spotlight on Digital Worlds

Documentation was circulated with the Agenda. Katrina Milaney, Associate Vice-President Research, Steven Bryant, Academic Lead, Transdisciplinary Scholarship, Marina Gavrilova, Academic Co-Lead, Digital Worlds ITS Area of Focus, Tyler Williamson, Academic Co-Lead, Digital Worlds ITS Area of Focus, Mohammad Keyhani, Academic Co-Lead, Digital Worlds ITS Area of Focus, and Alanna Bartolini, Senior Specialist, ITS, Digital Worlds Area of Focus, presented this item.

Highlights:

- The presenters reminded the Committee that there are five areas of focus within the Institutes for Transdisciplinary Scholarship (ITS), each of which will form a community of scholars, and then gave a presentation on the Digital Worlds area of focus, including:
 - Digital worlds is defined as the interconnected global ecosystem of technologies that we interact with across aspects of our lives, including the internet, social media, gaming, artificial intelligence (AI), virtual and augmented reality, quantum computing, and blockchain. Data is generated, stored, and transmitted in digital form, which allows for connections and collaborations over distances. Technology has changed how we socialize and consume goods and it impacts elections and political decisions.
 - o Al is currently receiving a lot of attention, with its potential uses such as Al-based decision making
 - The Digital Worlds co-leads were identified and came together as a team in June 2024. The first challenge for the Digital Worlds area of focus is to think about what the University's vision should be around digital worlds and the opportunities in this area that would provide the University with a sustainable advantage. Quantum and AI have strong potential for growth at the University. Transdisciplinary work extending beyond STEM (science, technology, engineering, and math) is valuable because not all researchers have computer science or engineering strengths but can impact digital worlds research.
 - The Digital Worlds area of focus is specifically working on:
 - Expanding cross-campus, national, and international collaborations, such as through the following grant-funded projects: Quantum Inspired Trustworthy AI, Propaganda and Misinformation Detection, Public Opinion Mining on Health and Trust by Canadians, Confronting Digital Injustice, and AI for Mental Health.
 - Participating in engagement opportunities, including: Digital Technology and Healthy City 2025, Canada AI 2025 Trustworthy and Explainable AI Workshop, Banff International Research Station (BIRS) XAI 2024 Invited Panel, Conference on Computer Vision and Pattern Recognition (CVPR) 2025 XAI Workshop, and Geneva Science and Diplomacy Anticipation (GESDA) 2024 Summit Geneva Science and Technology Accelerator.
 - Contributing to the development of transdisciplinary degree and certificate programs.
 - Mechanisms that will support the Digital Worlds area of focus include: transdisciplinary grants; funding for transdisciplinary postdoctoral scholars and graduate students; shared infrastructure and services; labs, centers, and institutes devoted to the discipline; faculty cross-appointments; unconventional new faculty hiring; and partnerships with industry and the community.
- In response to questions, it was reported that:
 - There is overlap between the Digital Worlds area of focus and the Health and Life area of focus. At the time that the areas of focus were being developed, there was debate over whether silos should be created by establishing the five areas of focus, but it was decided to proceed with expectation that communication and collaborations would occur.
 - The work that researchers within the Digital Worlds area of focus will do could be broad, with narrower specific initiatives, and will range from exploratory to solutions driven.
 - Gatherings have been held, including attendees from the arts, social sciences, and other disciplines, at which inclusive definitions such as around AI were discussed. Connector grants will help bring together researchers from different disciplines with common interests in addressing real world problems, and this relationship building will result in the development of new and inclusive language.

4. One Child Every Child Canada First Research Excellence Fund (CFREF) Initiative Update

Documentation was circulated with the Agenda. Benedikt Hallgrimsson, Deputy Director at the Alberta Children's Hospital Research Institute and One Child Every Child Precision Health and Wellness and Data Co-Lead, and Joanne Weninger, Executive Director, Alberta Children's Hospital Research Institute and One Child Every Child Initiative, presented this item.

Highlights:

- The presenters reported that the One Child Every Child initiative is one of 12 projects funded by the Canada First Research Excellence Fund (CFREF), that the CFREF funding was matched by partners including the Alberta Children's Hospital Foundation and the Azrieli Foundation, and that the initiative is in its second year. The presenters then presented on One Child Every Child, including:
 - The initiative was proposed because Canada underperforms in child health outcomes, ranked in 2020 as 30th among 38 high income countries in the world. This is in part because Canada does not invest in health care at the same rate as many other countries.
 - O Globally, infectious disease and maternal and perinatal health are the greatest burden on child health. In Canada, mental and brain health and chronic disease are the greatest burden on child health.
 - The One Child Every Child initiative's transdisciplinary approach has three stages: 1) to understand the problems by identifying biomedical, social, and environmental determinants; 2) to delve into the causes and to design and evaluate interventions to impact child health and wellness outcomes; and 3) to evaluate the value and potential impacts of the solutions, to prioritize the interventions, and to engage knowledge mobilization. The research intersects society's needs, gaps in knowledge, and the University's strengths.
 - The initiative's research framework has three themes (Better Beginnings, Precision Health and Wellness, and Vulnerable to Thriving) and six cross-cutting accelerators (Indigenous Ways of Knowing; Equity, Diversity and Inclusion (EDI); Transdisciplinary Training; Comprehensive Data; Technology Solutions; and Impact, Evaluation, and Knowledge Mobilization). The initiative has a parallel paths structure to meet Indigenous needs, with an Indigenous Accelerator Team to support the learning of non-Indigenous researchers and an Indigenous Path Team to support Indigenous researchers' projects.
 - Through grand challenges, the initiative will reach the following outcomes: research excellence and breakthroughs, approaches to transform health outcomes with Indigenous peoples, strategies that benefit communities and society, the next generation of scholars, and an EDI framework and action plan.
 - The One Child Every Child initiative will strategically focus on a few major projects and not many small projects, will involve partnerships, and will leverage opportunities.
 - The initiative has two planning streams, one for the initiative's major research programs and one for provincial, national, and international engagement.
 - o In 2024-2025 the One Child Every Child initiative will be growing through catalyst grants and will be developing theme strategic plans and the EDI action plan. The next stage will begin in 2025-2026 with the launch of the first major research programs/platforms and the start of engagement/knowledge mobilization. Additional rounds of research programs/platforms and engagement/knowledge mobilization will launch in 2026-2027 and 2027-2028.
 - The initiative has 46 Principal Investigators (PIs) based at the University of Calgary and seven based at the University of Alberta. These PIs have leadership roles. There are currently 203 Investigators, based at the University of Calgary, University of Alberta, University of Lethbridge, Athabasca University, and other Canadian and international institutions. These Investigators come from a broad range of disciplines and will be working on the One Child Every Child programs. There are currently 94 trainees connected to the initiative, including graduate students, residents, and undergraduate students.

- In response to questions, it was reported that:
 - The One Child Every Child initiative has postdoctoral fellowships match funded through the Vice-President (Research) program and the CFREF and Alberta Children's Hospital Foundation funding.
 - The One Child Every Child CFREF grant will end in 2030-2031. There is planning underway so that the work can continue with other competitive grant funding. Long term goals include having sustainable research programs/platforms and a building housing permanent units, somewhat like the Cumming School of Medicine's Centre for Health Genomics and Informatics (CHGI).
 - The federal CFREF funding was critical in being able to scale the One Child Every Child initiative to what it is going to be. Not all types of grants can support large teams of researchers.
 - Some research chair positions linked to the One Child Every Child initiative are in place in the Cumming School of Medicine. These research chairs have to date been primarily used for retention, but in the future there will be open competitions for research chairs. It is possible that there could also be endowed chairs, across disciplines, in the future.

5. 2026 Canada Excellence Research Chair Competition

Documentation was circulated with the Agenda. Robert Thompson, Associate Vice-President (Research), presented this item.

Highlights:

- The presenter noted that the Canada Excellence Research Chairs (CERC) program is similar to but larger than the Canada Research Chairs (CRC) program and reported that:
 - The CERC program launched in 2008 as part of the federal government's efforts to transform Canada into a global player in research and innovation, and the program is for recruiting world-leading researchers to Canadian universities.
 - The CRC program funds at \$100,000-200,000 per year while the CERC program funds at \$500,000-1,000,000 per year (salary and research funding).
 - There have been four CERC competitions since 2008. The competition run in 2017 was called the Canada 150 Research Chairs program, because of Canada's sesquicentennial anniversary that year.
 - The University has received three CERC chairs to date: Steven Bryant (nanotechnology), Deborah McGregor (climate and water sustainability), and Urbasi Sinha (quantum science and technologies).
 - For the 2022 competition, the work was handled at the institutional, not Faculty, level with a focus on multidisciplinary and transdisciplinary concepts and the University's existing strengths. The University had been granted an envelope of \$3,000,000 for this competition. Six proposals went into the selection process, four were put forward with viable candidates, and two were ultimately successful.
 - O The next CERC competition ends in 2026 and so work has begun. Presentations have been made to the Associate Deans Research Council and the Deans' Council. For this competition the University will meld the Faculty and institutional models, with priorities and opportunities to be identified at the Faculty level in Fall 2024 (teams or individuals can submit ideas) and budgeting and full proposal development at the institutional level. Detailed information from the federal government about the 2026 competition and its deadlines is being awaited. It is anticipated that there will be a match funding expectation, but it is not yet known what the source of the match funds will be. By the end of December 2024 the multidisciplinary topic areas for moving on to the selection process will be chosen by the Vice-President (Research) office and the candidate searches will be conducted by Faculties in the first half of 2025. The University will be ready to put forward candidates and full applications at the deadline which is expected to be early in 2026.

- In response to questions, it was reported that:
 - The University's envelope for the 2022 competition was \$3,000,000 and six concepts were developed. The
 University is hoping for a larger envelope for the 2026 competition. It is expected that the allocations will
 be announced in January 2025.
 - The CERC appointments follow a formal hiring process. The CERC appointments are eight-year tenured
 positions, not renewable. Long term Faculty budgeting can consider continuing an appointment or other
 avenues to continue an appointment can be pursued.
 - The \$500,000 CERC appointments are not considered to be more prestigious than the \$1,000,000 CERC appointments. Some research programs are more expensive to run than others.
 - When the CERC program launched its goal was to attract research talent to Canada. Putting forward a Canadian candidate has never been forbidden, but an extra form explaining why it is advantageous to move a researcher within Canada is needed. The 2022 competition resulted in several moves within Canada. It is the University's preference to focus on international candidates, but an internal candidate would be considered.
 - The Vice-President (Research) office has not preselected areas of priority, and is motivated to identify and move forward the best ideas and approach the best candidates.

6. Other Business

There was no other business.

7. Adjournment

Moved/Seconded

That the Research and Scholarship Committee adjourn the October 17, 2024 meeting.

Carried

The meeting was adjourned at 3:46 p.m.

Courtney McVie University Secretary