Canada Research Chair (Tier 1) in Remote Sensing of Snow Hydrology

**Department:** Geography and Planning  
**Location:** Saskatoon  
**Posted Date:** 2/25/2020

To enhance the capability of Canada and the University of Saskatchewan (USask) to deliver transformative science in freshwater security, the Department of Geography and Planning in the College of Arts and Science at USask invites applications for a Tier 1 Canada Research Chair (CRC) in Remote Sensing of Snow Hydrology. The Canada Research Chairs Program is the flagship of a national strategy to make Canada one of the world’s top countries in research and development. Tier I Chairs are intended for outstanding researchers acknowledged by their peers as world leaders in their fields.

The CRC in Remote Sensing of Snow Hydrology will lead a snow hydrology and remote sensing research program and will be a core member of the Global Institute for Water Security (GIWS). The Chair will use innovative remote sensing observations to gain new insights into the cryosphere, including seasonal dynamics of the snowpack from watershed to regional and global scales. These include improved understanding, modeling and prediction of snow accumulation, snowpack extent, snow depth and storage changes, snow density, snow water equivalent, snowmelt rates, snowpack ablation, dust deposition, and impacts on snowmelt runoff, flooding and streamflow. The candidate should be highly experienced with airborne measurement platforms and with advanced sensor development. They will be a global leader in snow hydrology and remote sensing, and will have interests in working with Environment and Climate Change Canada and the Canadian Space Agency on developing a potential satellite mission for global snow remote sensing. Areas of research strength at GIWS include climate change and water security, land-water management and environment, biogeochemistry and water quality, groundwater hydrogeology, sustainable development, socio-hydrology, toxicology and water and health. The successful candidate will display visionary leadership and will demonstrate excellence in interdisciplinary collaboration within GIWS, with several other units across campus, and with Provincial and Federal stakeholders. They will collaborate extensively with the snow hydrology group, the
hydrologic prediction group and the Centre for Hydrology at GIWS’ Coldwater Laboratory in Canmore, AB.

Research activity in the Department of Geography and Planning exemplifies the spirit of the disciplines of geography and planning and is concentrated in four overlapping domains: hydrology, earth and environmental systems; applied and scientific geomatics; planning and management of the built and natural environment; and healthy communities. Much of the department’s research occurs at the boundaries of these domains, is cross-cutting, and is focused on integrative approaches to addressing scholarly and societal challenges and mobilizing knowledge.

The College of Arts and Science offers a dynamic combination of programs in the sciences, social sciences, humanities, and fine arts. There are over 10,000 students in the College and 299 faculty, including 7 Canada Research Chairs. The College emphasizes student and faculty research, interdisciplinary programs, community outreach and international opportunities.

The Global Institute for Water Security is a research-intensive institute at USask, which manages individual research programs of more than 94 faculty members from 21 academic units. GIWS ensures that society has the understanding and the tools to sustainably manage and protect the world’s water resources; and to ensure that Canada, and the world, has the research and expertise needed to understand our water systems in an era of rapid societal and environmental change. Since its inception in March 2011, the institute has established itself as one of the premier research-intensive institutions locally (ranked #1 in Canada) and globally (ranked #19) in the field of Water Resources.

The University of Saskatchewan is one of Canada’s top 15 research-intensive universities. Its main campus is situated on Treaty 6 Territory and the Homeland of the Métis. The University of Saskatchewan is located in Saskatoon, Saskatchewan, a city on the banks of the South Saskatchewan River known for its quality of life, diverse and thriving economic base, a vibrant arts community and a full range of leisure opportunities. The University has a reputation for excellence in teaching, research and scholarly activities and offers a full range of undergraduate, graduate, and professional programs to a student population of over 25,000.

Qualifications

Applicants must have a Ph.D. and experience at the Full Professor level in a relevant field.
We are seeking candidates who demonstrate excellence, innovation, creativity, and leadership in research through a superior record of research excellence with demonstrated international impact in their field. The successful candidate is expected to have a track record of leading a vibrant externally-funded research program. The candidate will make strong contributions to teaching at both undergraduate and graduate levels. Applicants should demonstrate excellence in graduate student and postdoctoral fellow supervision, and superior ability for securing competitive external research funding.

The successful applicant will be appointed as a tenured faculty member at the Full Professor level in the Department of Geography and Planning and will be nominated for a Tier 1 Canada Research Chair. The CRC nomination is subject to review and final approval by the Canada Research Chairs Program.

The standard salary band for Full Professor for the 2020-2021 academic year is $135,145 to $157,804 plus competitive merit-based additions. This position includes a comprehensive benefits package which includes a dental, health and extended vision care plan; pension plan, life insurance (compulsory and voluntary), academic long term disability, sick leave, travel insurance, death benefits, an employee assistance program, a professional expense allowance, and a flexible health and wellness spending program.

**How to Apply**

Applications for this position should include a cover letter outlining the candidate’s fit with the advertised position and with GIWS, a curriculum vitae, a summary of research achievements and teaching interests, a brief outline of the proposed research program, and the names and contact information for five referees. Applications should be submitted using the University’s online application portal. Click on the “Apply Now” button (top left side of the page) to submit an application. Visit the Tips for Applying page for instructions on how to apply. As part of the application process, applicants will be asked to complete a voluntary employment equity survey.

Review of applications will begin on April 1, 2020; however, applications will be accepted and evaluated until the position is filled.

The impact of leaves (e.g., parental leave, extended leave due to illness, etc.) will be carefully considered when reviewing the candidate’s record of research achievement. Therefore, candidates are encouraged to explain in their application how career interruptions may have impacted them.
The University of Saskatchewan is committed to supporting employees in need of accommodation in an employment context. For more information on the University of Saskatchewan’s accommodation policy, please contact Carine.Paley@usask.ca (306-966-8560).

The University of Saskatchewan is committed to diversity, inclusion, and equity in the workplace and encourages applications from members of the four designated equity groups (women, members of a visible minority/racialized group, Indigenous persons, and persons with a disability/disabilities). All qualified candidates, Canadian and other nationalities are encouraged to apply. Recruitment will be guided by the Canada Research Chairs Equity, Diversity and Inclusion Practices and by the strong commitment of the University of Saskatchewan and the College of Arts and Science to diversity, inclusion, and equity.

For questions related to this position or the selection process, please contact Prof. Alec Aitken, Chair, Department of Geography and Planning, alec.aitken@usask.ca; (306) 966-5672.

Date Posted: 2/25/2020

The University believes equity, diversity, and inclusion strengthen the community and enhance excellence, innovation and creativity. We are dedicated to recruiting individuals who will enrich our work and learning environments.

We are committed to providing accommodations to those with a disability or medical necessity. If you require an accommodation in order to participate in the recruitment process, please notify us and we will work together on the accommodation request.

The University of Saskatchewan’s main campus is situated on Treaty 6 Territory and the Homeland of the Métis. We pay our respects to the First Nations and Métis ancestors of this place and reaffirm our relationship with one another. Together, we are uplifting Indigenization to a place of prominence at the University of Saskatchewan.