Field of Specialization:	Smart, Healthy, and Sustainable Communities and Environments
Academic Unit:	Civil and Environmental Engineering, Electronics, Mechanical and Aerospace Engineering, Systems and computer Engineering, Information Technology
Category of Appointment:	Preliminary (Tenure-Track)/Tenured – 4 POSITIONS
Rank/Position Title:	Assistant/Associate Professor
Start Date:	July 1, 2022
Closing Date:	Complete applications will be considered starting April 30, 2021 and continue until the positions are filled

About the Positions:

The Faculty of Engineering and Design at Carleton University in Ottawa invites applications for four Tier 2 Canada Research Chairs (CRCs) in Smart, Healthy, and Sustainable Communities and Environments. These are exciting opportunities to become part of a growing and renewing Faculty that is strategically investing in this area of research.

Tier 2 Chairs are intended for exceptional emerging researchers (i.e. candidate will typically be less than 10 years from their highest degree at the time of nomination, or more than 10 years and has experienced legitimate career interruptions), acknowledged by their peers as having potential to lead in their field. Applicants who are more than 10 years from their highest degree may have their eligibility for a Tier 2 Canada Research Chair assessed through the program's Tier 2 justification process (http://www.chairs-chaires.gc.ca/). Please contact Carleton's research grants office (https://carleton.ca/coris/) for more information.

Successful candidates will have original, innovative, and high-quality research programs that fit with an emphasis on promoting healthy and sustainable communities or natural environments across different aspects of life. These could include infrastructure, transportation, healthcare and wellness (including biomedical engineering), employment, education, recreation, sport and leisure, or arts and culture. Their research will interact with one or more of the Faculty's areas of strengths:

- Urban and environmental systems (buildings, bridges, transportation, air, land, water, waste)
- Energy management in power electronics, distributed generation, lighting, or convergent networks
- Renewable energy engineering (building/district systems, demand-supply management, energy storage, micro-cogeneration, renewables)
- Energy-economy modelling and forecasting at national or provincial levels
- Greenhouse gas emissions monitoring and reduction, carbon-neutral and net-negative emissions pathways, or advanced thermodynamic cycles
- Intelligent systems with interest in interdisciplinary and community-engaged research impacting vulnerable, under-served, remote, isolated, or Indigenous communities, as well as people with disabilities
- Telecommunications engaged in e-health, cybersecurity, and data analytics
- Artificial intelligence to process and react to data from smart communities and environments to address interdisciplinary challenges

Qualifications:

With a strong emerging record of publications and research funding, candidates will have an interdisciplinary orientation and the capacity to engage in both independent and collaborative research

programs. They will establish a strong research program, contribute to various program areas, teach at a reduced level, supervise graduate students, and develop research collaborations with industry.

A Ph.D. is required along with an excellent track record of high-quality research output that demonstrates potential for independent research, and a demonstrated aptitude for teaching courses at the undergraduate and graduate levels. Candidates are also expected to demonstrate the potential to develop research collaborations with industry, supervise graduate-student, and attract funding to support independent research programs yielding high-quality peer-reviewed publications.

Candidates will be eligible to be appointed at the Assistant or Associate Professor rank within the Departments of Civil and Environmental Engineering, Electronics, Mechanical and Aerospace Engineering, Systems and Computer Engineering, and the School of Information Technology. For those appointed to the four engineering departments, they will be required to become registered as a professional engineer in Ontario within five years of appointment. The successful candidates will ideally join the Faculty of Engineering and Design as soon as possible but no later than July 1, 2022.

About the Faculty of Engineering and Design:
Research-intensive, with expertise in areas that include sustainability, infrastructure resilience, and data analytics, the Faculty of Engineering and Design is composed of four engineering departments and the Schools of Information Technology, Architecture and Urbanism, and Industrial Design. Its 185 academics and 83 staff members provide 6,000 undergraduate and 1,200 graduate students with an extensive range of undergraduate, graduate, and doctoral programs. Since 2019, the Faculty has been growing and renewing its faculty complement and infrastructure. It is creating about 100 new faculty positions (in addition to replacing retirements) and is expanding and enriching its research enterprise in terms of space and graduate student numbers. More information is available at https://carleton.ca/engineering-design/.

Application Instructions:
To see the full posting, please visit https://carleton.ca/provost/jobs/academics/

Applications should include a letter of interest (incorporating a statement of the department/school they envisage as their home unit for teaching purposes, a brief five-year research program plan and a record of teaching effectiveness), curriculum vitae, and the names of three references (who will not be contacted without consent of the candidate) and may be submitted electronically, as one PDF file, in confidence, until April 30th to: Laverne Smith & Associates Inc. at CarletonCRCs@lavernesmith.com.

Please also identify any past experiences in supporting equity, diversity and inclusion in your previous institutional environment such as in curriculum development and in supporting diverse students.

Please indicate in your application if you are a Canadian citizen or permanent resident of Canada.

To help us develop our equity programs, a confidential equity and diversity self-identification survey will be sent to all applicants separately.

About Carleton University:
Carleton University is a dynamic and innovative research and teaching institution with a national and international reputation as a leader in collaborative teaching and learning, research and governance. With over 31,000 students in more than 100 programs of study, we encourage creative risk-taking,

discovery, and the generation of transformative knowledge. We are proud to be one of the most accessible campuses in North America. Carleton's Paul Menton Centre for Students with Disabilities has been heralded as the gold standard for disability support services in Canada.

Carleton's location in Ottawa, Ontario provides many opportunities for scholarship and research with numerous and diverse groups and institutions. Canada's capital has a population of over one million and reflects the country's bilingual and multicultural character. To learn more about our university and the City of Ottawa, please visit www.carleton.ca/about.

We are strongly committed to equity, diversity, and inclusion in the nomination and appointment process. Carleton University is committed to fostering diversity within its community as a source of excellence, cultural enrichment, and social strength. We welcome those who would contribute to the further diversification of our university including, but not limited to: women; visible minorities; First Nations, Inuit and Métis peoples; persons with disabilities; and persons of any sexual orientation, gender identity and/or expression. Carleton understands that career paths vary. Legitimate career interruptions will in no way prejudice the assessment process and their impact will be carefully considered.

Applicants selected for an interview are asked to contact the Chair as soon as possible to discuss any accommodation requirements. Arrangements will be made in a timely manner.

All qualified candidates are encouraged to apply; however, Canadians and permanent residents will be given priority. All positions are subject to budgetary approval.