



Tier I CANADA RESEARCH CHAIR in Complex Environmental Systems Modeling and Analysis

The Faculty of Science at Western University is pleased to announce a search for a Tier I Canada Research Chair in Complex Environmental Systems Modeling and Analysis to be appointed to a tenured position at the rank of Associate Professor or Professor. The rank will be commensurate with the successful applicant's qualifications and experience. The candidate must have a Ph.D. in Biology, Statistics, or a related field and a demonstrated record of independent research accomplishments. The successful candidate will be an expert in the development and/or use of models and analytical tools to study and quantify ecological patterns and processes. The successful candidate will be jointly appointed to the Departments of Biology (<http://www.uwo.ca/biology>) and Statistical & Actuarial Sciences (<http://www.stats.uwo.ca>). The anticipated start date will be July 1, 2018 or as negotiated.

In order to participate in Western's exciting new initiatives in the area of Big Data, the successful candidate will have extensive experience in the development and/or application of statistical or computational methodologies that utilize large scale quantitative data sets to address questions involving complex systems, including ecological applications. Statisticians who work collaboratively with ecologists to analyze data with parametric and non-parametric space-time models and ecologists who use mathematical modeling to study spatial dynamics and/or long-term field sites are encouraged to apply.

Ecologists at Western address a wide range of globally-relevant questions related to climate change impacts at multiple scales, from the individual to ecosystem level. Key areas include animal movement and ecosystem function. Western's researchers have also built state-of-the-art experimental facilities to advance research in these areas, including the Advanced Facility for Avian Research (www.birds.uwo.ca), the Biotron (www.thebiotron.ca), The Environmental Sciences Western Field Station (www.uwo.ca/esw) and the Laboratory for Stable Isotope Sciences (www.uwo.ca/earth/LSIS).

The ability to effectively collect, analyze and model big data, often in real time, is essential to the success of cutting-edge ecological research. Western Statisticians are leaders in developing new techniques for modelling environmental data with both spatial and temporal variability, for example for modelling and managing forest fires, analyzing mark-recapture studies of wild animal populations to understand the effects of human impacts, and modeling recurrent weevil and other pest infestations. Western's researchers are also supported by the world-class computational infrastructure of Sharcnet and the Southern Ontario Smart Computing Innovation Platform (SOSCIP).

In accordance with the regulations set for Tier 1 Canada Research Chairs (www.chairs-chaire.gc.ca), the successful candidate will be an outstanding and innovative researcher whose accomplishments are recognized globally for having made a major impact in their field as evidenced by recognition in influential publications in top tier international journals, impact on government policy, and active membership on advisory boards and international panels and/or editorship on major journals. Demonstrated success in attracting high levels of external funding,

