



UNIVERSITY OF
CALGARY

**Graduate Student in Vector Ecology Modelling
Department of Ecosystem and Public Health
Faculty of Veterinary Medicine
University of Calgary**

The Department of Ecosystem and Public Health, the Faculty of Veterinary Medicine, is seeking a graduate student (MSc) with an interest in the ecological modelling of disease vectors.

Project description:

The successful candidate will join an interdisciplinary team, which includes colleagues from veterinary medicine, geography, environmental design and government to estimate the current and future risk of vector borne diseases occurring in Alberta. The project builds on previous work examining the environmental and climatic factors that determine the range of *Culicoides sonorensis*, which are the main arthropod vector for Bluetongue (BTV) and Epizootic hemorrhagic disease (EHD). The likely distribution of the species over the next 25 and 50 years under different climate change scenarios was also examined. In the current project, modeling tools will be used build on our earlier project results, and will allow for estimates of vector abundance, one of the key elements in assessing disease transmission risk for livestock and wildlife in western Canada. The project will also provide the opportunity for a graduate student to gain additional skills in developing and delivering policy relevant research. The vector abundance and disease risk maps generated from this project will inform risk assessments as well as the development of cost effective surveillance programs for both the *Culicoides* spp. vectors and the diseases that they might transmit.

What are we looking for:

The preferred candidate needs to be a good team player with good communication skills, both within the academic as well as the non-academic setting. Candidates should possess a background in ecology; priority will be given to candidates with some knowledge and experience in ecological modelling, entomology and skills in Geographical Information Systems (GIS). Ability and interest to learn are key.

UCVM is a new and dynamic veterinary faculty in Western Canada that is committed to strengthen the connections between animal health, public health, and the environment. UCVM faculty works across disciplines and Departments, fostering collaborative research, teaching and service. Descriptions of the Faculty and its departments can be found on the UCVM website (www.vet.ucalgary.ca). The University of Calgary is a research-intensive, comprehensive university that supports innovation in research, education and service to the community.

Calgary is a vibrant, multicultural city with a population of 1,200,000. It is located near the Rocky Mountains, Banff National Park and Lake Louise and offers an enormous opportunity for outdoor activities both in winter and summer.

Applicants with a Biology or Ecology degree or with a degree in related field will be considered. The graduate program will help the successful candidate develop strong skills in vector ecology, biostatistics, and epidemiological modelling. The salary will be commensurate with the level of education and experience. For additional information please contact Dr A. Massolo (amassolo@ucalgary.ca).

Review of applications is ongoing and will be finalized by winter 2016. Interested individuals should submit a current curriculum vitae and an outline of research interests along with the names of three referees to:

Alessandro Massolo (MSc, PhD); Associate Professor, Wildlife Health Ecology
Dept. of Ecosystem and Public Health, Faculty of Veterinary Medicine, Univ. of Calgary
3280 Hospital Drive, NW, Calgary, AB, Canada T2N 4N1
Phone: +1 (403) 210-6734; Fax: +1 (403) 210-6693; Mobile: +1 (403) 966-6775
amassolo@ucalgary.ca