



# ***Mathematical Biology Seminar***



**Monday, January 14, 2019**

**3 pm – 457 CAB**

**Eric Foxall**

**University of Alberta**

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## **Individual-based modelling of interacting populations**

In this talk, we explore a variety of individual-based stochastic models inspired from ecology, epidemiology, game theory and the social sciences. Our goal in each case is to understand the (global) population-level behaviour in terms of the (local) interaction rules. We pay special attention to large-population limit processes, both deterministic and stochastic, and to phase transitions that occur as model parameters are varied.