

Graduate Seminar

Dr Yuan Yuan, Memorial University

Friday, April 5, 2013

2:00-2:50 pm.

HH-3017

Applied Dynamics with Time Delay

Abstract:

In this talk, we first review some basic concepts and methods used in dynamical systems, then study the local/global stability and Hopf bifurcation in a general functional differential equation with distributed and some dynamical systems with constant delay. The analytic results are applied to a mathematical model of white blood cell production and neuron network models with ring construction. Numerical simulation are illustrated to verify the theoretical predictions.