

APPLIED MATHEMATICS SEMINAR
Department of Mathematics
University of West Georgia
4:40 PM, WEDNESDAY, SEPTEMBER 6, 2006, BOYD 304

Speaker: Dr. Nguyen Van Minh, UWG

Title: **Perron Theorem in the Monotone Iteration Method for Travelling Waves in Delayed Reaction-Diffusion Equations**

Abstract

In this talk, we revisit the existence of travelling waves for delayed reaction diffusion equations by the monotone iteration method. We show that Perron Theorem on existence of bounded solution provides a rigorous and constructive framework to find travelling wave solutions of reaction diffusion systems with time delay. The method is tried out on two classical examples with delay: the predator-prey and Belousov-Zhabotinskii models. This is a joint work with A. Boumenir.

All are welcome.