

THE MATHEMATICS DEPARTMENT PRESENTS

# A MATHEMATICS COLLOQUIUM

THURSDAY, May 17, 2007

BOND HALL 227

4:00 pm

**Title: Banach Algebras**

**Speaker: Andrew Good**, Western Washington University

**Abstract:** Several important spaces in functional analysis are Banach spaces. They are central to the study of integral and differential equations, and quantum probability theory. What if a complex algebra is also a Banach space that satisfies a certain condition? A number of interesting results follow from this pairing.

During this presentation, I will present background definitions and give several examples of Banach algebras. I will also give a short discussion of the Gelfand-Mazur theorem, and offer an application of spectral theory in Banach algebras to the Fundamental Theorem of Algebra.

Refreshments will precede the talk at 3:30pm in Bond Hall 300  
courtesy of Árpád Bényi.