# UNIVERSITY OF GEORGIA DEPARTMENT OF STATISTICS

## Colloquium

#### Is There Magic Left in Teaching Probability and Inference?

#### Nitis Mukhopadhyay University of Connecticut-Storrs

Lately, I have published on various topics in probability, statistical inference, and linear models. Those research topics arose from teaching mostly graduate level, and some undergraduate level, courses.

In this presentation, I will touch upon some of the limitations of invariant tests and Rao-Blackwell-Lehmann-Scheffe type theorems, as well some other interesting ideas with regard to Student's t-distributions, correlations, independence, and multivariate normality stuff. While I may not be able to touch upon every single aspect, I will try to highlight some specific interesting problems with their resolutions while indicating how these things arose to begin with.

These are teaching-related ideas leading to research and I find them very exciting. I normally discuss some of these ideas and examples-counterexamples in my teaching so that a classroom experience has a reasonable chance to become a living-breathing thing. I hope to share my excitement and positive experiences in this regard with my audience. I am reasonably sure that a major part of my presentation should be accessible to the students.

### Thursday November 11, 2010

3:30 P.M., Room 306 Statistics Building University of Georgia Athens, GA 30602

Refreshments following the talk at 4:30 P.M. in room 230 (The Cohen Room)