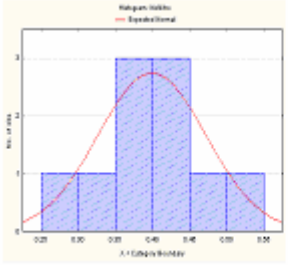
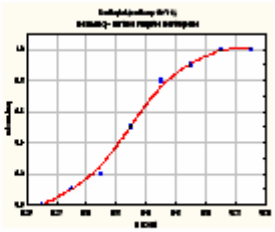


Statistics

Research (StaR) Colloquium



Seminar

Dept of Mathematics and Statistics
King Fahd University of Petroleum and Minerals

Presenter	**Dr. I. Rahimov, Dr. M.H. Omar, and Mr. M. Malik** **Dept of Mathematics and Statistics** **KFUPM**
Title	**Is the Bootstrap Always Valid?** **(part 2 of 2)**
Topic & (Level)	Bootstrap, Resampling, Validity **(Methodology)**
Audience	All KFUPM community are cordially Invited
Date	Sunday, Jan 25, 2009
Time	1:00 PM – 1:50 PM
Location	Building 5, Smart Classroom # 203

Abstract

When theoretical sampling distributions are not known or are intractable for statistical inference purposes, the empirical bootstrap (Efron, 1979) distribution provide a useful alternative. The bootstrap procedure has found widespread use including deriving conditional standard error of estimates in true score equating, deriving the empirical distribution for the sample median, and deriving confidence intervals for sample percentile. In addition, the bootstrap procedure has increased its popularity with increasing advancement of computing technology.

With its popularity and ease, the bootstrap has been used in many situations even when its use may be questionable. Thus, some researchers have questioned when the bootstrap procedure is valid. In this 2-part seminar, we will discuss this issue theoretically and empirically in general situations. We will also discuss the problem in the case of modeling with a non-homogeneous branching stochastic process.

Tea and Coffee will be served