

1046-Y1-2041 **J K Denny*** (denny_jk@mercer.edu), Department of Mathematics, 1400 Coleman Avenue, Macon, GA 31207. *Materials for Analyzing Sensitivity using the Partial Rank Correlation Coefficient*. Preliminary report.

The partial rank correlation coefficient (PRCC) gives a measure of the sensitivity of a differential equations model to its parameters. We will present software and materials for introducing undergraduate students to the use of Latin hypercube sampling to randomly sample a parameter space and then use the resulting information to compute the PRCC. Examples will be provided to demonstrate the use of these methods. Students should then be able to apply these techniques to their own modeling projects. (Received September 16, 2008)