## **Applied Statistics for Research-I**

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<u>Class Info:</u> Tuesday & Thursday 8am – 9:20am

<u>Text</u>: Required: <u>Introduction to the Practice of Statistics</u> by

D.S. Moore and G.P. McCabe. (3<sup>rd</sup>, 4<sup>th</sup>, 5<sup>th</sup>, 6<sup>th</sup>, 7<sup>th</sup>, 8<sup>th</sup> or 9<sup>th</sup> edition)

Optional: SPSS for Windows Student Version

Objective: This course is for graduate students who intend to design

studies and analyze data. This course stands by itself and also serves as a background for further statistics courses, helping to provide the intuition which can sometimes be lost amid the formulas.

Topics to be discussed include normal & binomial distributions, CLT, confidence intervals & significance tests, categorical data, ANOVA,

nonparametric procedures, correlation, simple linear regression, scatterplot smoothing and multiple regression. Examples from a variety of fields will

be presented.

Homework: A variety of problems will be assigned to give you experience with the

material.

<u>Calculators</u>: Every student should have access to a calculator.

<u>Computation</u>: This course will make use of the SPSS and R statistical packages. No

previous computer experience is assumed.