PSYC2900 - Statistics for Behavioral and Social Sciences

Credits:	4 (3/1/0)
Description:	Meets MnTC Goal Area 5. Students will use basic mathematical and computerized procedures to analyze data in the behavioral sciences. The course will cover the use of statistical software to conduct descriptive and inferential data analyses. Students will choose and apply statistical procedures to help answer psychological and behavioral scientific research questions. Students will also learn to read, interpret and write reports based on American Psychological Association style guidelines.
Prerequisites:	• MATH 1114 or higher • PSYC 1200 with a grade of "C" or higher
Corequisites:	
Pre/Corequisites*:	
Competencies:	1. Demonstrate an understanding of the mathematics and logic behind selecting and applying statistical procedures appropriate for a given hypothesis, scale of measurement and experimental design. 2. Perform and describe the statistical procedures commonly used by social scientists and identify their respective advantages and disadvantages. 3. Create visual displays of data, such as bar charts and histograms. 4. Calculate measures of central tendency, variability and frequency distributions. 5. Perform correlational and regression analyses. 6. Describe and complete inferential statistical procedures, including t-tests, Analysis of Variance (ANOVA), multiple comparison tests, confidence intervals and effect sizes. 7. Perform nonparametric tests, such as chi-square. 8. Read, interpret and summarize basic statistical conclusions from psychological and behavioral science courses accurately, and critically evaluate the statistical presentations of others. 9. Interpret statistical findings and graphs in the context of their level of statistical significance, confidence intervals, effect sizes and underlying assumptions, and explain these findings using common language and conventions of the American Psychological Association. 10. Use SPSS or another statistical package to build data sets, run univariate analyses, and interpret and display results.
MnTC goal areas:	5. History and the Social and Behavioral Sciences

**Can be taking as a Prerequisite or Corequisite.*