PSY 249 Statistics for Psychology

Summer 2023

Course Credits: 4
Contact Hours: 55 hours
Instructor: TBA
Email:TBA

COURSE OBJECTIVES

This course provides an introduction to the basic principles of descriptive and inferential statistics used in psychological research. Topics include frequency distributions, measures of central tendency and variability, the normal curve, correlation and regression analysis, as well as hypothesis testing, t-tests, and chi-square tests. Through application to psychology, students will learn how to interpret and analyze statistical data in order to draw meaningful conclusions from empirical research.

Upon Completion of this Course, students will be able to:

1. Develop an understanding of the basic principles of descriptive statistics.
2. Gain knowledge of inferential statistics, including hypothesis testing, t-tests, and chi-square tests.
3. Learn how to apply statistical concepts to analyze psychological data.
4. Develop skills in interpreting statistical data and drawing meaningful conclusions.
5. Enhance critical thinking skills related to empirical research in psychology.

PREREQUISITES

N/A

GRADING

Grades will be determined by accumulating points, with 100 points being the maximum, as follows:

ITEM	POINTS
Quizzes	20 Points
Midterm 1	15 Points
Midterm 2	15 Points
Project 2	20 Points
Final Exam	30 Points
Total	100 Points

Late submissions will be graded at the end of the course. Grades will be assigned according to the following rule:

A ≥ 90 > B ≥ 80 > C ≥ 70 > D ≥ 60 > F.

We reserve the right to make adjustments to the overall grading policy.

COURSE MATERIALS

Required Texts:

Discovering Statistics Using IBM SPSS Statistics, 5th Edition, by Andy Field.

Recommended (Optional) Texts or Other Materials:

None

COURSE TOPICS

MODULE	TASKS
Module 1	**Topics:** Topic 1: Introduction to Statistics for Psychology Topic 2: Introduction to statistical concepts Topic 3: Descriptive Statistics Topic 4: Frequency distributions **Assessments:** Quiz#1

Module 2	**Topics:** Topic 5: Normal Curve Topic 6: Using the normal curve in statistical analysis Topic 7: Correlation and Regression Analysis Topic 8: Understanding correlation and regression **Assessments:** Quiz#2 Project
Module 3	**Topics:** Topic 9: Applications of correlation and regression in psychology research Topic 10: Inferential Statistics Topic 11: Hypothesis testing Topic 12: Inferential Statistics (cont.) **Assessments:** Midterm#1 Project
Module 4	**Topics:** Topic 13: Chi-square tests Topic 14: Applications of inferential statistics in psychology research Topic 15: Applying Statistics to Psychology Topic 16: Research design and data collection **Assessments:** Midterm#2
Module 5	**Topics:** Topic 17: Interpreting Statistical Data Topic 18: Statistical Analysis in the Future of Psychology Topic 19: Emerging trends in statistical analysis Topic 20: Future directions in psychological research **Assessments:** Final Exam

ATTENDANCE

1) Class attendance is required. Missing classes without permission will lead to decrease in overall grade.

Missing less than two classes: no penalty.

Missing more than two classes: 7% will be taken off from the overall grade.

If the instructor reports a student's frequent missing of class to the Soochow University Academic Administration Office, the student might get a written warning

and might be prohibited from attending final exam.

2) Participants in this course are expected to arrive in class promptly and adequately prepared. The primary objective of this course is to critically engage with the readings and the subject matter. Therefore, course participants are expected to have completed the reading prior to class and prepare thoughtful reflections/commentaries to share with fellow colleagues.

LEARNING REQUIREMENTS

1) Late assignments are not acceptable and are subjected to grade deductions.
2) Assignments submitted in the wrong format will be counted as not submitted.
3) Failure to submit or fulfill any required course component results in failure of the class.
4) Make-up for midterm and final exams only with valid excuses, as defined by the University.
5) In order to earn a Certificate of Completion, participants must thoughtfully complete all assignments by stated deadlines and earn an average quiz score of 50% or greater.

TECHNOLOGY POLICY

The use of electronic devices in class is distracting, both for the user and for the rest of the class. Only non-programmable calculators can be used in the tests and exam. Any attempts to use cell phones and other electronic communication devices will be seemed as cheating. Laptops are discouraged, unless you use them for activities DIRECTLY related to the course (eg., note taking, reading course documents).

ACEDEMIC INTEGRITY POLICY

Soochow University highly values the academic integrity and aims to promote the academic fairness, honesty and responsibility. Any academic dishonesty behaviors and any attempts to cheats and plagiarism will be reported to the university administration office. A written warning and the relevant penalties will be imposed. The record might be shown on the official university transcript.

DISABILITY ACCOMMODATION

Soochow University is committed to maintaining a barrier-free environment so that students with disabilities can fully access programs, courses, services, and activities at Soochow University. Students with disabilities who require accommodations for access to and/or participation in this course are welcome.

Note:

Please contact the University Administrative Office immediately if you have a learning disability, a medical issue, or any other type of problem that prevents professors from seeing you have learned the course material.