SJSU SAN JOSÉ STATE UNIVERSITY

College of Social Sciences · Psychology

Advanced Research Methods in Psychology

PSYC 118

Spring 2026 Section 86 Fully Online 3 Unit(s) 01/22/2026 to 05/11/2026 Modified 01/21/2026

Course Information

Lecture

Tuesday, Thursday, 5:30 PM to 6:20 PM
Online; Zoom

Lab (Section 87)

Tuesday, 6:30 PM to 8:30 PM
Online; Zoom : (see link on lab page)

Lab (Section 88)

Thursday, 6:30 PM to 8:30 PM
Online; Zoom : (see link on lab page)

Course Description and Requisites

Descriptive, correlational, quasi-experimental, and experimental approaches: design, methodology, and analysis. Experience designing, conducting, analyzing, and presenting (verbal and written) research findings. Topics include: hypothesis testing, validity, reliability, scales of measurement, questionnaire development, power, statistical significance, and effect size.

Prerequisite: Lower division GE complete; STAT 95, PSYC 18, PSYC 100W with a "C" or better (or departmental approval), Upper division standing, Psychology or Behavioral Science majors only.

Letter Graded

Classroom Protocols

Classroom Protocol

Students are expected to maintain a level of professional and courteous behavior at all times, including treating other students with respect (interruptions, distractions, unnecessary comments). Students not abiding by these policies will be asked to leave the class.

Online synchronous instruction works best when everyone is engaged. This includes keeping your camera on, your microphone muted (unless speaking), utilizing reactions/chat effectivelly. If you are going to be distracted (at work, driving, stepping away from your computer) there is no point in coming to class.

Dropping and Adding

Students are responsible for understanding the policies and procedures about add/drop, grade forgiveness, etc. Refer to the current semester's catalog, https://catalog.sjsu.edu/, policy section. The new Add/Late Drop Policy, S22-6, will be implementing a new combined Add/Drop deadline of September 15 this fall. Find additional information here; Undergraduate Late Drop and Semester Withdrawal.
Information about the latest changes and new is available at the Advising Hub at https://www.sjsu.edu/advising/

Attendance

Attendance is not going to be taken (with the exception of the first two weeks of the course). **Attendance is strongly encouraged, and the students that earn the highest marks are the ones that attend regularly.**

Use of Generative AI in This Course

The use of generative AI tools is only permitted within the parameters set by the instructor.

In alignment with the SJSU Student Conduct Code students must present work that is authentically their own. In this course, the use of generative AI tools is only permitted within the parameters provided by the instructor, specific to each assignment, with appropriate attribution. As this policy may be different from other course AI policies, please ask your instructor to clarify any questions you may have.

Program Information

Program learning outcomes (PLOs) are skills and knowledge that students will have achieved upon completion of the Psychology BA degree. Each course in our curriculum contributes to one or more of these PLOs. The PLOs for the Psychology BA degree are:

1. Knowledge Base of Psychology. Students will be able to demonstrate familiarity with the major concepts, theoretical perspectives, empirical findings, and historical trends in psychology.

2. Research Methods in Psychology. Students will be able to design, implement, and communicate basic research methods in psychology, including research design, data analysis, and interpretations.
3. Critical Thinking Skills. Students will be able to use critical and creative thinking, skeptical inquiry, and a scientific approach to address issues related to behavior and mental processes.
4. Applications of Psychology. Students will be able to apply psychological principles to individual, interpersonal, group, and societal issues.
   Values in Psychology. Students will value empirical evidence, tolerate ambiguity, act ethically, and recognize their role and responsibility as a member of society.

Course Learning Outcomes (CLOs)

CLO1 - Understand the scientific method and how it is applied specifically to test hypothesis and answer questions in psychology

CLO2 - Understand how to do a literature search in order to provide the background for a research project

CLO 3 - Comprehend research articles in psychological research and critically evaluate them

CLO 4 - Be able to design a study in psychology in order to test a specific hypothesis

CLO 5 - Understand the ethical ramifications of research in psychology and when/where they apply

CLO 6 - Use statistics in order to analyze a dataset, specific to the a priori hypotheses set up by the investigator

CLO 7 - Understand how information is disseminated in psychological research, through presentations and research papers, and be able to write your own APA-style paper

Course Materials

Methods in Behavioral Research

Author: Cozby PC, Bates S
Publisher: McGraw-Hill
Edition: 15th
ISBN: ISBN10: 1264558341 / ISBN13: 9781264558346

Course Requirements and Assignments

Lecture Exams

There will be four exams evenly spaced throughout the semester on the lecture material. Each exam will be a series of short-answer questions that need to be answered based on the lecture material. All exams will be open note and open book, but MUST be completed during the synchronous period which

they are held. A final exam will be given during exam week that is cumulative, however you have a drop exam which can mitigate this. Each exam is worth 40 points (4x40 = 160 points total)

This assignment is related to : CLO1, CLO5, CLO7

Lab Assignments

During the lab portion, students will conduct an assignment (typically with other group members) that needs to be **completed and turned in during the lab portion of the course**. This will be posted and submitted on the Canvas for the lab. Each Lab Assignment is worth 2 points a piece, and 12 need to be completed for full credit (2x12=24 points)

This assignment is related to : CLO2, CLO3, CLO4, CLO6

Specific Aims

Group Project Early in the semester, as your group is putting together their lab project, you will be required to submit an idea for your research project, taking the form of a "Specific Aims" page that you would normally find on a grant. This spec aims page is worth 20 points (1x20=20 points)

This assignment is related to : CLO4

Research Participation

As part of conducting our research we will also act as participants in others research projects. You'll be required to complete four of these studies in order to receive full credit (4x4=16 points)

This assignment is related to : CLO1, CLO3

Final Research Talk

Group Project In the last week of classes, you will present with your group a talk on the research project that you have completed. This talk will be in the form of a Powerpoint/Google Slide presentation and will be structured very similar to a scientific paper. This talk will be worth 80 points (1x80=80 points)

This assignment is related to : CLO6, CLO7

✔ Grading Information

Your total grade will be an aggregate of your performance on both individual and group assignments for a total of 300 points.

Individual Assignments *(done on your own)*

Best of four lecture exams (160 points)

Research Participation (16 points)

Group Assignments (*done with your group, grade applies to every member of the group):*

Lab Assignments (24 points)

Specific Aims (20 points)

Final Research Project/Talk (80 points)

University Policies

Per University Policy S16-9 (PDF) (http://www.sjsu.edu/senate/docs/S16-9.pdf), relevant university policy concerning all courses, such as student responsibilities, academic integrity, accommodations, dropping and adding, consent for recording of class, etc. and available student services (e.g. learning assistance, counseling, and other resources) are listed on the Syllabus Information (https://www.sjsu.edu/curriculum/courses/syllabus-info.php) web page. Make sure to visit this page to review and be aware of these university policies and resources.

Course Schedule

When	Topic	Notes
Thursday 01/22/2026 5:30 PM - 6:20 PM	Class Overview	
Tuesday 01/27/2026 5:30 PM - 6:20 PM	Chapter 1	Using Science to Study Human Behavior
Thursday 01/29/2026 5:30 PM - 6:20 PM	Chapter 2	Getting Started / Literature Search
Tuesday 02/03/2026 5:30 PM - 6:20 PM	Chapter 2	Getting Started / LIterature Search
Thursday 02/05/2026 5:30 PM - 6:20 PM	Chapter 3	Ethics in Behavioral Research

When	Topic	Notes
Tuesday 02/10/2026 5:30 PM - 6:20 PM	Chapter 3	Ethics in Behavioral Research
Thursday 02/12/2026 5:30 PM - 6:20 PM	Chapter 4	Fundamental Research Issues
Tuesday 02/17/2026 5:30 PM - 6:20 PM	Chapter 4	Fundamental Research Issues
Thursday 02/19/2026 5:30 PM - 6:20 PM		EXAM ONE (Chapters 1 - 4)
Tuesday 02/24/2026 5:30 PM - 6:20 PM	Chapter 5	Measurement Concepts
Thursday 02/26/2026 5:30 PM - 6:20 PM	Chapter 5	Measurement Concepts
Tuesday 03/03/2026 5:30 PM - 6:20 PM	Chapter 6	Observational Methods
Thursday 03/05/2026 5:30 PM - 6:20 PM	Chapter 7	Survey Research
Tuesday 03/10/2026 5:30 PM - 6:20 PM	Chapter 7	Survey Research
Thursday 03/12/2026 5:30 PM - 6:20 PM		EXAM TWO (Chapters 5-7)
Tuesday 03/17/2026 5:30 PM - 6:20 PM	Chapter 8	Experimental Design Specific Aims DUE (Tuesday Lab)

When	Topic	Notes
Thursday 03/19/2026 5:30 PM - 6:20 PM	Chapter 8	Experimental Design Specific Aims DUE (Thursday Lab)
Tuesday 03/24/2026 5:30 PM - 6:20 PM	Chapter 9	Conducting Experiments
Thursday 03/26/2026 5:30 PM - 6:20 PM	Chapter 9	Conducting Experiments
Tuesday 03/31/2026 5:30 PM - 6:20 PM		NO CLASS : SPRING BREAK
Thursday 04/02/2026 5:30 PM - 6:20 PM		NO CLASS : Spring Break
Tuesday 04/07/2026 5:30 PM - 6:20 PM	Chapter 10	Complex Experimental Design
Thursday 04/09/2026 5:30 PM - 6:20 PM	Chapter 10	Complex Experimental Designs
Tuesday 04/14/2026 5:30 PM - 6:20 PM		EXAM THREE (Chapters 8-10)
Thursday 04/16/2026 5:30 PM - 6:20 PM	Chapter 11	Other Experimental Designs
Tuesday 04/21/2026 5:30 PM - 6:20 PM	Chapter 11	Other Experimental Designs
Thursday 04/23/2026 5:30 PM - 6:20 PM	Chapter 12	Descriptive + Relational Statistics

When	Topic	Notes
Tuesday 04/28/2026 5:30 PM - 6:20 PM	Chapter 13	Inferential Statistics
Tuesday 04/30/2026 5:30 PM - 6:20 PM	Chapter 13	Inferential Statistics
Tuesday 05/05/2026 5:30 PM - 6:20 PM	Chapter 14	Generalization
Thursday 05/07/2026 5:30 PM - 6:20 PM		EXAM FOUR (Chapters 11 - 14) RESEARCH PROJECT PROPOSAL WEEK
Tuesday 12/16/2025 3:15 PM - 5:15 PM		FINAL EXAM *NOTE : 3:15 start time*