Sabancı University
Faculty of Arts & Social Sciences

PSY 503: Data Analysis for Psychological Sciences II
Spring 2022

Instructor: Emre Selçuk

Course Description: PSY 503 is the second of a two-part series surveying common data analytic approaches in psychology research. The course will build on PSY 502 and mostly focus on mixed-effects models. We will also continue discussing practices to improve the quality of data analytic approaches and decisions.

Course Plan: You can find a tentative list of topics below. The course will include a mix of video lectures, readings, in-class assignments, and online discussions. Video lectures and readings will be posted on SUCourse on a weekly basis, depending on our pace. You are expected to watch the video lectures and read the assigned papers before the in-class meetings. In-class meetings will take place on Mondays from 14:40 to 16:30 at FASS 1103 and will largely consist of exercises on mixed-effects models. Please note that in-class meetings are not hybrid sessions (i.e., there is no simultaneous online component). The online meetings will take place on Thursdays from 11:40 to 12:30 and will largely consist of Q & As on the readings, lectures, and exercises. Please visit SUCourse for the Zoom meeting link.

Course Assessment: The in-class assignments will make up 40% of your course grade. You can earn points from the assignments only if you attend the class. Assignments submitted without attending the class will not be graded and will not receive any feedback. The remaining 60% of your grade will be based on an in-class exam. The exam will be held on May 30th.

Grades: The following grading scheme is used to assign the final grade for the course. No changes can be made to your final grade unless there has been an arithmetical error.

A	100-90	**B**	79.99-75	**C**	64.99-60	**D**	49.99-45
A-	89.99-85	**B-**	74.99-70	**C-**	59.99-55	**F**	44.99-0
B+	84.99-80	**C+**	69.99-65	**D+**	54.99-50		

Make-up for missed assignments and exams: In order to be eligible to take a make-up exam or assignment, you should have a valid and documented excuse.

Academic Integrity: Every student is expected to abide by the Sabancı University Academic Integrity Statement. Please see https://www.sabanciuniv.edu/en/academic-integrity-statement

Tentative List of Topics

Please note that the emphasis is on tentative. We will try to cover as much as we can during the semester. We may add or remove topics depending on our progress. The goal is to make sure that you master each topic we cover. Remember that we will go as far as you take us!

Introductory concepts on mixed-effects models
Fixed vs. random effects
Partitioning random variation to sources
Random intercept & random slope models
Hierarchical linear models
Growth curve models
Cross-classified models
Factor analysis (Bonus topic after the exam)