PSYC 310: Laboratory in Developmental Psychology

Spring 2020 Wednesday, 11:30-1:00 PM, KINSC Stokes 004

Professor: Ryan Lei, PhD

Contact: rlei1@haverford.edu; 610-896-1758

Office: KINSC Sharpless 412 Office hours: by appointment

Course Description and Learning Goals: The goal of this laboratory course is to provide students with hands-on experience in the design, execution, analysis, and presentation of developmental psychology research. Throughout the semester, students will write an APA-style research report detailing the experimental rationale, methods, results, and broader implications of the experiments. The concrete skills I hope you'll gain are enumerated below:

- You will be able to write a complete APA-style research report
- You will be able to develop a script and understanding for how to conduct research with children
- You will be able to analyze and report descriptive and inferential statistics using R

Course Readings: There is no textbook for this course. On several occasions, however, journal articles or other readings will be distributed electronically. Access to the APA style guide is strongly recommended. Copies are on reserve in the Science Library.

Attendance and Participation: Laboratory research requires dedication and commitment. Except when conflicts are discussed ahead of time, **attendance at lab sessions is mandatory**. This includes scheduled visits to your partner site. If you have a conflict during a course meeting, it is your responsibility to let me (and your partner and/or group members) know as soon as possible and I will determine whether the absence is excusable. Unexcused absences will result in a ½ grade deduction from your final grade.

Laboratory research also requires the ability to work effectively and respectfully as part of a team. Individual team members may have different strengths—that is okay. The goal is to learn from each other and support one another in our experiments. That said, everyone is required to be engaged and actively participate in our experiments. Failure to do so will negatively impact your final grade.

Assignments, Late Work, and Magic Genies: Assignments are due week for which they are listed. For example, in Week 3, you will be asked to provide a breakdown of the Methods & Results for a paper. That is due in Week 3, NOT the following week. Any assignments that are turned in late will be deducted 10 points for every day that it is late. I have a strict deadline policy: if the deadline is 11am, then at 11:01am, then assignment is late. That being said, I understand that things come up that are often outside of your control (sickness, family emergencies, etc.). For this purpose, you will be able to use a Magic Genie, which grants you ONE 48-hour extension, no explanation necessary.

Course Policies: We will spend a substantial amount of course time discussing the ethics of conducting research with children, and all students will be required to follow established procedures and protocol for working with children in a research setting. Not taking this responsibility seriously will not be tolerated and will result in immediate removal from the course and notification of the Office of Academic Affairs and the Honor Council. Taking photos, videos, or other digital media is strictly prohibited. If you see another student interacting with

children in a way that makes you uncomfortable, or if you feel uncomfortable for any other reason, please come speak with me as soon as possible. On days where we will be working directly with children, please wear closed-toed shoes and appropriate attire.

Accessibility Statement: Haverford College is committed to supporting the learning process for all students. Please contact me as soon as possible if you are having difficulties in the course. There are also many resources on campus available to you as a student, including the Office of Academic Resources (https://www.haverford.edu/oar/) and the Office of Access and Disability Services (https://www.haverford.edu/access-and-disability-services/). If you think you may need accommodations because of a disability, you should contact Access and Disability Services at hcads@haverford.edu. If you have already been approved to receive academic accommodations and would like to request accommodations in this course because of a disability, please meet with me privately at the beginning of the semester (ideally within the first two weeks) with your verification letter.

Grading:

Participation: 20 % Assignments: 30 % Peer Reviews: 15 %

Final Research Report: 35 % Total Points Possible: 100

Grade scale

A = 94-100

A- = 90-93.99B+ = 87-89.99

B = 83-86.99

B- = 80-82.99

C+ = 77-79.99

C = 73-76.99

C - = 70-72.99

D+ = 67-69.99D = 60-66.99

F = 59.99 and below

At the end of the semester, I will calculate your grade and determine if I believe it correctly reflects your achievement in this course. Final grades will be assigned at my discretion.

Week	Course Schedule Course Schedule	Readings	Activities	Assignment Due
1 – Jan. 22	Intro & Paperwork (clearances including new one)		Setting community guidelines	In class stats review
2 –	Ethics of working with children	Rhodes, Leslie,	How to explain	

Jan. 29	& minimal groups	ыансні, & Спанк, 2017	to children	
3 – Feb. 5	Observational, cross-sectional and longitudinal methods: observing the state of the world	1. Shoda, Mischel, & Peake, 1990 2. What is the marshmallow test really measuring?	What are individual differences? Third variable problems Cohort effects	Breakdown of methods and results section for Shoda et al., 1990
4 – Feb. 12	Measurement: reliability, validity, and types of variables	Martin & Little, 1990	Guidelines for interacting with children	
5 – Feb. 19	Power & Stats Lab 1: Familiarization with R and Descriptive Statistics		Build rapport with students at partner site	Recreate script from Martin & Little, 1990
6 – Feb. 26	Experimental methods: determining causality, within vs. between subjects designs, and counterbalancing	Giles & Heyman, 2005	Build rapport with students at partner site	Generate <i>your own</i> script for your group project
7 – Mar. 4	Reflection on visits, in class feedback on scripts and developing group script			Observation notes from first visit
8 – Mar. 11	SPRING BREAK			
9 – Mar. 18	Stats Lab 2: Linear and Logistic Regression		Initial testing sessions with partner site	
10 – Mar. 25	Writing workshop: Methods & Results			Regression output
11 – Apr. 1	Stats Lab 3: Multiple Regression			Annotated bibliography for your group project
12 – Apr. 8	Writing workshop: Introduction	Read the section on writing an introduction from this link		Methods & Results section
13 – Apr. 15	Replication and Reproducibility in Developmental Science	Davis-Kean & Ellis, 2019	Final sessions with partner site	
14 – Apr. 22	Stats Workshop or Catch up day			
15 – Apr. 29	Project Presentations & Final Wrap-up			Final Research Paper due during Finals Period