

Tentative Schedule

9/3/2021

Week	Day	Date	Topic	Guest Speaker	Readings	Due
1	TH	2-Sep	Introduction & Course Expectations			
2	T	7-Sep	Fundamentals of Science and How We Study the Brain		CH.1 JHANGIANI et al. (https://kpu.pressbooks.pub/psychmethods4) CH.2 JHANGIANI et al. (https://kpu.pressbooks.pub/psychmethods4)	September 10th is last day
2	TH	9-Sep	Research Ethics		CH.3 JHANGIANI et al. (https://kpu.pressbooks.pub/psychmethods4)	Team Charter Due by Friday
3	T	14-Sep	Sources of Information	Laura Mullen (Rutgers Behavioral Sciences Librarian)		
3	TH	16-Sep	Ethics Training: CITI TRAINING			Topic Approval Due by Friday
4	T	21-Sep	Open Science/Replication		- Simmons, J. P., Nelson, L. D., & Simonsohn, U. (2011). False-Positive Psychology: Undisclosed Flexibility in Data Collection and Analysis Allows Presenting Anything as Significant. Psychological Science, 22(11), 1359–1366. (https://drive.google.com/drive/u/1/folders/1CbBiEiATGn3ltgcp-) https://doi.org/10.1177/0956797611417632 ; - Nosek, B. A., Ebersole, C. R., DeHaven, A. C., & Mellor, D. T. (2018). The preregistration revolution. Proceedings of the National Academy of Sciences, 115(11), 2600. (https://drive.google.com/drive/u/1/folders/1CbBiEiATGn3ltgcp-) https://doi.org/10.1073/pnas.1708274114)	
4	Th	23-Sep	Open Science/Replication		- Brandt, M. J., IJzerman, H., Dijksterhuis, A., Farach, F. J., Geller, J., Giner-Sorolla, R., Grange, J. A., Perugini, M., Spies, J. R., & van 't Veer, A. (2014). The Replication Recipe: What makes for a convincing replication? Journal of Experimental Social Psychology, 50, 217–224 (https://drive.google.com/drive/u/1/folders/1CbBiEiATGn3ltgcp-) https://doi.org/10.1016/j.jesp.2013.10.005 ; - Frank, M. C., & Saxe, R. (2012). Teaching Replication. Perspectives on Psychological Science, 7(6), 600–604. https://doi.org/10.1177/1745691612460160 (https://drive.google.com/drive/u/1/folders/1CbBiEiATGn3ltgcp-)	1 page summary, CITI training
5	T	28-Sep	Psychological Measurement		CH.4 JHANGIANI et al. (https://kpu.pressbooks.pub/psychmethods4)	
5	Th	30-Sep	Experiment Basics		CH.5 JHANGIANI et al. (https://kpu.pressbooks.pub/psychmethods4)	

Week	Day	Date	Topic	Guest Speaker	Readings	Due
6	T	5-Oct	Exploring Cognition Through the Eyes: Reading and Eye-tracking		<p>- Rayner, K., Schotter, E. R., Masson, M. E. J., Potter, M. C., & Treiman, R. (2016). So Much to Read, So Little Time: How Do We Read, and Can Speed Reading Help? <i>Psychological Science in the Public Interest</i>, 17(1), 4–34 https://drive.google.com/drive/u/1/folders/1CapJ1wTrnFsDVVlg-Yz https://doi.org/10.1177/1529100615623267</p> <p>- Slattery, T. J. Eye movements: From psycholinguistics to font design. In <i>Digital Fonts and Reading</i> (eds Dyson, M. C. & Yuen, C. Y.), 54–78 (World Scientific, 2016). https://drive.google.com/drive/u/1/folders/1CapJ1wTrnFsDVVlg-Yz</p>	
6	TH	7-Oct	Exploring Cognition Through the Eyes: Pupillometry	Sarah Colby (University of Iowa): Pupillometry	<p>- Torres A and Hout M (2019) Pupils: A Window Into the Mind. <i>Front. Young Minds</i>. 7:3. doi: 10.3389/frym.2019.00003 https://drive.google.com/drive/u/1/folders/1CapJ1wTrnFsDVVlg-Yz</p> <p>- Laeng, B., Sirois, S., & Gredebäck, G. (2012). Pupillometry: A Window to the Preconscious? <i>Perspectives on Psychological Science</i>, 7(1), 18–27. https://drive.google.com/drive/u/1/folders/1CapJ1wTrnFsDVVlg-Yz https://doi.org/10.1177/1745691611427316 https://doi.org/10.1177/1745691611427305</p>	Preregistration due by Frida
7	T	12-Oct	Exploring Cognition Through the Eyes: Eye-tracking and Pupillometry (RuCCS eye-tracking lab)			
7	TH	14-Oct	Exploring Cognition Through the Brain: EEG	McCall Syrett (Villanova University): EEG	<p>- Allopenna, P. D. , Magnuson, J. S. , & Tanenhaus, M. K. (1998). Tracking the time course of spoken word recognition using eye movements: Evidence for continuous mapping models. <i>Journal of Memory and Language</i>, 38, 419–439. https://drive.google.com/drive/u/1/folders/1_</p>	
8	T	19-Oct	Exploring Cognition Through the Brain : EEG	Ryan Rhodes (Rutgers University): EEG	<p>- Etienne, A., Laroia, T., Weigle, H., Afelin, A., Kelly, S. K., Krishnan, A., & Grover, P. (2020). Novel Electrodes for Reliable EEG Recordings on Coarse and Curly Hair. <i>BioRxiv</i>, 2020.02.26.965202. https://drive.google.com/drive/u/1/folders/1_ https://doi.org/10.1101/2020.02.26.965202</p>	
8	TH	21-Oct	Exploring Cognition Through the Brain: EEG			

Week	Day	Date	Topic	Guest Speaker	Readings	Due
9	T	26-Oct	Understanding Cognition Through the Brain: fMRI	Melissa Thye (University of Edinburgh): fMRI/sEEG	<p>- Racine, E., Bar-Ilan, O., & Illes, J. (2005). fMRI in the public eye. <i>Nature Reviews Neuroscience</i>, 6(2), 159–164. (https://drive.google.com/drive/u/1/folders/1j) (https://doi.org/10.1038/nrn1609)</p> <p>- Turner, R. (2016). Uses, misuses, new uses and fundamental limitations of magnetic resonance imaging in cognitive science. <i>Philosophical Transactions of the Royal Society B: Biological Sciences</i>, 371(1705). (https://drive.google.com/drive/u/1/folders/1j) (https://doi.org/10.1098/rstb.2015.0349-)</p> <p>Amanamba U., Sojka A., Harris S., Bucknam M., & Hegdé, J. (2020) A Window Into Your Brain: How fMRI Helps Us Understand What Is Going on Inside Our Heads. <i>Front. Young Minds</i>. 8:484603. doi: 10.3389/frym.2020.484603</p>	
9	TH	28-Oct	Understanding Cognition Through the Brain: fMRI (The Center for Advanced Human Brain Imaging Research (CAHBIR))			
10	T	2-Nov	Exploring Cognition Through the Web		<p>- Crump, McDonnell, Gureckis (2013). Evaluating Amazon's Mechanical Turk as a Tool for Experimental Behavioral Research (https://drive.google.com/drive/u/1/folders/1z t1AO-RQB-tXC-rrD)</p> <p>- Bridges, D., Pitiot, A., MacAskill, M. R., & Peirce, J. W. (2020). The timing mega-study: Comparing a range of experiment generators, both lab-based and online. <i>PeerJ</i>, 8, e9414. (https://drive.google.com/drive/u/1/folders/1z t1AO-RQB-tXC-rrD) https://doi.org/10.7717/peerj.9414- (https://doi.org/10.7717/peerj.9414-) - Grootswagers, T. A primer on running human behavioral experiments online. <i>Behav Res</i> 52, 2283–2286 (2020). https://doi.org/10.3758/s13428-020-01395-3</p> <p>- Gagné, N., & Franzen, L., Ph.D. (2021, August 30). How to run behavioural experiments online: best practice suggestions for cognitive psychology and neuroscience. (https://drive.google.com/drive/u/0/folders/1z t1AO-RQB-tXC-rrD) https://doi.org/10.31234/osf.io/nt67j (https://doi.org/10.31234/osf.io/nt67j)</p>	
10	TH	4-Nov	No Class - Psychonomics No Calss			
11	T	9-Nov	Introduction to Python/PsychoPy and Pavlovia			
11	TH	11-Nov		Lucia Cherep (Univeristy of Arizona): VR		
12	T	16-Nov	Introduction to Python/PsychoPy and Pavlovia & Normalizing Errors			

Week	Day	Date	Topic	Guest Speaker	Readings	Due
12	TH	18-Nov	Programming Experiments			
13	T	23-Nov	Programming Experiments			
13	TH	25-Nov	Thanksgiving Break (No Class)			
14	T	30-Nov	Data Collection			Programmed Experiment D
14	TH	2-Dec	Data Collection			
15	T	7-Dec	Data Analysis			
15	TH	9-Dec	Data Analysis			Methods and Data Analysis
16	T	14-Dec	Class Presentations			
16	TH	16-Dec	Class Presentations			
		12/20/2021 - 12/23/2021	FINAL EXAMS (DECEMBER 20th-DECEMBER 23rd)			Paper Due by December 23