

Note: from 7-8am on Tue-Fri and from 4:30-5:30pm Mon-Thu Dr. Savoy will be available for extra discussion

Monday (General Introduction to All of fMRI; Tour and Sample Data)

8:00 - 9:45	- A, B -	Overview of the Program and fMRI-Based Experiments	Robert Savoy
10:00 - 12:30	- C -	Basics of NMR and MRI: Sources of Signal and Contrast; Image Acquisition; Contrast and Tradeoffs; Safety, HRC/IRB Considerations <i>(with a short break)</i>	Robert Savoy
12:30 - 1:30		<i>Lunch</i>	
1:30 - ~2:15		Participant Introductions; Begin Design Workshop and Selection of Groups	<i>Participants</i>
2:15 - 3:15	- D -	Data Analysis Part 1: Block Design; t-Tests; Ideas for Data Reduction and the GLM	Robert Savoy
3:30 - 4:00	-E-	Data Analysis Part 1 (continued): Systematic Overview	Robert Savoy
4:00 - 5:00		Informal Discussion; Optional Virtual Tour of MRI room	Robert Savoy & <i>Participants</i>

Tuesday

8:00 - 10:00	- H -	Experimental Task Design in Functional Neuroimaging <i>(with a short break)</i>	Robert Savoy
10:30 - 11:15	- I -	Data Analysis Part 2: Preprocessing	Robert Savoy
11:30 - 12:30	- N -	Data Analysis Part 3: First Level Estimation	Robert Savoy
12:30 - 1:30		<i>Lunch</i>	
1:30 - 2:30	- O -	Data Analysis Part 4: Second Level Estimation	Doug Greve
2:45 - 3:15		Experimental Design Workshop start	Robert Savoy
3:30 - 4:30	- J -	fMRIPrep: A Robust Preprocessing Pipeline for fMRI Data	Christopher Markiewicz

Times to be determined: Small Group Zoom Meetings to design experiments

*Staff**; Robert Savoy

Wednesday

8:00 - 10:00	- M -	Resting State fMRI Connectivity and Multivariate Analysis <i>(with a short break)</i>	Robert Savoy
10:15 - 10:45	- P -	Computational Neuroanatomy	Robert Savoy
10:45 - 11:15	- Q -	Overview and Combining Software Packages	Robert Savoy
11:30 - 12:30		<i>Lunch</i>	
12:30 - 1:45	- R -	DSI / DTI / Tractography: Getting at White Matter Tracts with MRI	Anastasia Yendiki
1:45 - 1:50		Reminder of the rest of the day / Design Workshop discussions	Robert Savoy
1:50 - 2:15		Databases & Reproducibility Resources	Robert Savoy
2:15 - 3:15	- K, L -	Advances in Single Trial Design; Visualizing the FIR Model of Analysis	Robert Savoy
3:30 - 4:30	- G -	Optimizing Data Acquisition; Advanced Techniques in Data Acquisition	Blaise Frederick
4:45 -		Informal Discussion of the Day's lectures	Robert Savoy & <i>Participants</i>

Times to be determined: Small Group Zoom Meetings to design experiments

*Staff**; Robert Savoy

Thursday

8:00 - 8:45	- C -	Review of Basic MRI (Optional, for those interested; same slides as Monday 10:00)	Savoy
9:00 - 10:45	- C' -	Topics in Advanced MRI (e.g., Phase Encoding; Arterial Spin Labeling; other by request)	Jon Polimeni
11:00 - 12:00		<i>to be determined [Informal Lab Tour; possible design workshop time; etc]</i>	
12:00 - 12:30	- X -	Scanning Children and Adolescents <i>(during Lunch)</i>	Constanza M. Vidal Bustamante
12:30 - 1:00		<i>(discussions during Lunch)</i>	
1:00 - 2:20	- T -	Data Analysis Part 5: Inference & Critical Thresholds; Review; Q&A	Doug Greve
2:35 - 4:00	- V -	Seed-Based fMRI Functional Connectivity	Susan Whitfield-Gabrieli
4:30 - 5:30		Extra Time for Discussion if needed	Robert Savoy

Times to be determined: Preparing Presentations; Discussions with experts

*Participants and Staff**

Friday

8:00 - 8:45	- W -	Selected Topics in fMRI: Experimental Task Design in the Age of Connectivity; Clinical Considerations; Using Large N examples; Grant Writing; etc	Robert Savoy
9:00 - 9:30	-- X -	Spinal Cord Imaging	Robert Barry
9:30 - 10:00	- Y -	Command Line Analysis of an Experiment and Visualization Demo of Freesurfer	Matthew Vera
10:00 - 11:00	- U -	BIDS: Brain Imaging Data Structure; Quality Assurance Issues	Christopher Markiewicz
11:15 - 12:30		<i>Class Presentations: Future Experiments</i>	<i>The Program Participants!</i>
12:30 - 2:00		Class discussion / Feedback / Closing	Robert Savoy & Faculty