

PSYCHOLOGY 262: BEHAVIORAL NEUROSCIENCE
Fall 2020
Asynchronous

**For live, voluntary review sessions every Tuesday and Thursday 2:00-3:15 P.M:
Go to our Blackboard Site, click Tools→Zoom meeting→Start the session for
each date listed**

Instructor: Dr. Mitchell Roitman

Office: 1042C, Behavioral Science Building (BSB)

Office hours: Friday; 10-11 a.m. or by appointment

Join by going to Tools→Zoom meeting→Start the session for each date listed

Teaching assistant: Elizabeth Wenzel

Office hours: Wednesday; 10-11 a.m. or by appointment

Join via Zoom: Meeting ID: 938 2461 6653

Passcode: PSCH262!

email: ewenze4@uic.edu

Teaching assistant: Jillian Seiler

Office hours: Wednesday; 9-10 a.m.

Join via Zoom: Meeting ID: 917 3052 9054

Passcode: 504480

email: seiler3@uic.edu

Required text: Biopsychology, 10th edition, John P.J. Pinel

Website: **uic.blackboard.edu**

Behavioral Neuroscience represents the merging of Psychology and Biology. At its core, Behavioral Neuroscience seeks to explain complex behaviors by the physiological processes that underlie them. During the semester you will learn about how behavior is generated in response to events in the world around us. You will gain a significant understanding of the nervous system, how it is organized and how it communicates. We will cover how our bodies are built to receive information from the senses and turn that information into plans to move our bodies to react to those sensations. We will also cover how the endocrine system, which releases hormones, interacts with the nervous system and influences behavior. Finally, we will consider a biological basis for higher order function (e.g. learning and memory) as well as psychological disorders such as drug addiction and schizophrenia.

Tentative Class Schedule

Week	Date	Topic	Readings
1	8/25	Introduction	Chapt. 1
PART I: FOUNDATIONS OF BEHAVIORAL NEUROSCIENCE			
	8/27	Nervous system overview	Chapt. 3
2	9/01	Functional anatomy of the nervous system	Chapt. 3; Chapt 9; pages 221-226
	9/03	Neuronal membrane and potential	Chapt. 4; pages 77-87
3	9/08	Action potential	
	9/10	Neural transduction/Chemical signaling	Chapt. 4; pages 87-94
4	9/15	Chemical signaling	Chapt. 4; pages 94-101
	9/17	Chemical signaling	Chapt. 4
5	9/22	Exam I	
PART II: SENSING AND DOING – INTERACTING WITH THE EXTERNAL ENVIRONMENT			
	9/24	Sensory systems: somatosensory	Chapt. 7; pages 176-182
6	9/29	Somatosensory	Chapt. 8; pages 195-215
	10/01	Motor systems	
7	10/06	Sensory systems: vision	Chapt. 6; pages 134-151
	10/08	Sensory systems: vision	
8	10/13	Sensory systems: vision/audition	Chapt. 7; pages 167-176
	10/15	Sensory systems: audition	Chapt. 7; pages 184-190
9	10/20	Exam II	
PART III: HORMONES, HOMEOSTASIS AND BRAIN-BODY INTERACTIONS			
	10/22	Hormones and behavior: neuroendocrine system	Chapt. 13

10	10/27	Hormones and behavior: emotion and stress	Chapt 17
	10/29	Hormones and behavior: sexual behavior	Chapt 13
11	11/03	V O T E!!!!!!!!!!!!!!	US Constitution
	11/05	Hormones and behavior: eating and drinking	Chapt. 12
12	11/10	Sleep	Chapt. 14
	11/12	Exam III	
PART IV: HIGHER ORDER FUNCTION AND MALFUNCTION			
13	11/17	Learning and memory	Chapt. 11
	11/19	Learning and memory	
14	11/24	Psychological disorders: drug addiction	Chapt. 15
	11/26	NO CLASS: Thanksgiving	
15	12/01	Psychological disorders	Chapt. 18
	12/03	Psychological disorders	Chapt. 18
Finals Week		Exam IV	

* Day in the Life of your Brain paper is due

Evaluations

Weekly quiz: 5 points each X 15 weeks = 75 points

Essay exams: 25 points each X 4 = 100 points

Day in the Life of My Brain paper: 25 points

Pop culture or pop press/on-line **check-ins**: 15 points X 3 = 45 points

Quizzes: 5 multiple choice questions; must be completed by 5pm on Friday of each week of the semester. Quiz becomes available at 3:15pm each Thursday and you will have 15 minutes to complete it once you begin.

Essay exams: 3-4 prompts where you'll be asked to synthesize material across the "Part" of the course (see syllabus above for Parts). Exam dates in the above syllabus represent when your essay answers are due (by 3:15pm central time). Essays must be uploaded via SafeAssign. Submissions should be double-spaced 11pt font. You will receive essay prompts 48hrs prior to the due date/time. Due dates are not flexible...there will be **no make-up exams** except for the most serious of documented circumstances.

Day in the Life of My Brain paper: due on the final day of class. Further details will be posted to Blackboard at the start of Part IV of the course. In brief, this three-page, double spaced paper is due on the last day of class. For the paper, you will consider some of your daily activities and explain your behavior in terms of their biological bases. You'll incorporate material from at least 3 different lectures and cite slides and/or page numbers from the textbook. No additional materials will be necessary to draft the paper. Again, more detail will be provided later in the semester.

Check-ins: You will be contacted a week in advance to have an online (Zoom) 'check-in' with 9 of your classmates. You'll bring to that check-in an example of behavioral neuroscience in pop culture (movie clip; song) or the popular press (New York Times, Washington Post, CNN, etc.) that captures some small aspect of behavioral neuroscience. Check-ins will last about 20 min and will be an opportunity to better know the instructor and your classmates.

There will be no opportunities for extra credit.

ALL quizzes, exams, check-ins and papers will be used to calculate your final grade.

Scores for late assignments will be reduced by 10% for each day the assignment is late.

It is my hope that each student learns the material and succeeds. Cheating will not be tolerated. Evidence of cheating on any quiz, exam or assignment will result in its disqualification and an entry of 0 points. The incident will also be reported to UIC's Dean of Students Office.

You will be tested on information from lecture material and the textbook. Lectures will not be a regurgitation of what is in the textbook. The lectures will only highlight some of the information covered in the textbook while going into greater detail on other topics. To succeed in this class - ***and I want you to succeed*** - you should view all the lectures and read the assigned material. If you do poorly on a quiz, exam or assignment, you should visit with the T.A.s or me. Until exams are graded I cannot give grade-point cutoffs. However, **the overall class mean at the end of the semester, if below 80%, will be the lowest possible percentage to obtain a B in the course.** 10% increments above and below the overall class mean will be the cutoffs for the other letter grades. If the overall class mean is 80% or higher, then traditional cutoffs (A:100-90; B:89.9-80; C:79.9-70; D:69.9-60; F:59.9-0) will be used.

Accommodations are available for students with documented disabilities. Please notify the TAs and me during the first week of class of any accommodation needed for the course. Students with disabilities who require accommodations for access and participation in this course must be registered with the Disability Resource Center (DRC; 312-413-2183). Disabilities may arise due to unanticipated medical emergencies or other traumatic events. In the case of such a situation please contact the DRC at the time when the problem occurs, so that a counselor can determine whether any accommodations are needed.

Best wishes for an enjoyable semester!!!!