Class Meeting Times: N/A asych

PSY 330 COURSE INFO

Instructor: Dr. Elizabeth Flandreau (she/her)

Please sign up for an appointment to go over content Q&A, personal questions such as grades

Email Policy: Questions about the course are relevant to all students and *must* be posted to the discussion board so everyone can benefit from the answer!

- Please **do** email me if:
 - o your question is urgent and hasn't been answered on the discussion board
 - o you need a 1:1 outside my availability per calendly,
 - o you have a private matter that can't wait for a 1:1 meeting.
- I want to support all my students but am not great at email and *very much* appreciate your help so I can keep my inbox from becoming a bottomless <u>pit of despair</u>:
 - O When emailing, please include your name, what course you're in, (where relevant) what group you're in, and be specific about your question / request / agenda.
 - o I typically respond to emails within one business day; if I haven't responded within three business days, please **re-send** the original email with a quick "hey not sure if you saw this yet."

Course Description: This course emphasizes the study of bodily structures, processes, and mechanisms related to various aspects of the organism's interactions with the environment. Topics covered include neurophysiological correlates of cognition, memory, motivation, emotion, attention, and sensory processes. *In other words:* the biological underpinnings of psychology.

Content-Specific Learning Objectives: My goal is for each student to learn the structures and functions of neurons and neural systems, as well as skills, strategies, and ways of thinking about neuroscience.

- 1. <u>Identify the structure and function of the major parts of the nervous system</u> at a cellular and systems (functional neuroanatomy) level
- 2. Describe the process of action potentials
- 3. Describe the process of neurotransmission
- 4. <u>Identify the behavioral function of major brain chemical systems</u>; predict the effect of damage to these cells, pathways, or structures.
- 5. Describe the general principles of psychopharmacology; predict the effect of specific drugs on synaptic transmission and degenerative disorders.
- 6. <u>Discuss basic research in behavioral neuroscience</u>; critique scientific claims, identify limitations to current knowledge, integrate information from varying sources into a cohesive whole
- 7. Relate biological processes to everyday behavior including sensory systems and learning and memory.

Skill-Specific Learning Objectives: In addition to content, you will gain / improve employable skills.

- 1. <u>Time management</u>: Like most STEM courses, this one is relatively content-heavy. It will be important to organize your study time for efficiency.
- 2. Reading for Content: Learning to engage in meaningful, directed reading is a great skill for ANY career.
- **3. Communication**: Each individual is expected to communicate verbally in class and through written communication in online discussion boards and essay exams.
- **4. Critical Thinking:** In this course you will be asked to look for patterns in the material, identify similarities and differences across topics, and link together diverse pieces of information into a cohesive scaffold.

Required Resources

- 1. Prerequisite: PSY 101
- 2. Time: Please anticipate devoting at least 10 hours per week to this course; I recommend creating a weekly routine as if there were a face-to-face component.
- 3. Open Access Textbooks^{1, 2}: Specific reading assignments will be posted to blackboard in the weekly folders as will any additional reading from other sources.
- 4. Technology Requirements
 - MS Office
 - <u>Zoom</u>

- Panopto
- Perusal

UNIVERSITY & COURSE POLICIES

This course is subject to the GVSU policies listed at http://www.gvsu.edu/coursepolicies/

Expectations of Inclusion: The purpose of this course is to learn neuroscience. Please treat your classmates and instructors with respect in person, and online. Please review GVSU's policy on <u>Anti-Racism</u> and <u>Title IX</u>. If you have any concerns, please contact me or the GVSU division of inclusion and equity (616) 331-3296).

Expectations of Integrity: Earning a degree from GVSU means you achieved knowledge, skills, and abilities worthy of that degree. Please do not short-change your education with cheating, plagiarizing, or lying. Instructors are required to report incidents of academic integrity violations. GVSU Academic Misconduct Portal

How to meet the integrity standards for GVSU

- Make sure you know which resources you're allowed to use
 - o Resources you can (and should!) use for weekly quizzes and assignments: Your teammates (weekly meetings and discussion boards), Your classmates (online discussion boards), Your textbooks (with proper in-text citations), Your instructor (class sessions, office hours, discussion board)
 - Resources you can (and should!) use for the exams: Your own personal notes written by you (see "own voice standard" for additional instructions).
- Always Cite your sources: In-Text and end of text citations should be used when you've gained ideas, understanding, words, or definitions from a source
- If you're not sure, ask! We share the same goal of student success. Let me know how I can help you.

Flandreau Own Voice Standard: This class requires integrating content across topics and demonstrating knowledge through application. You will be asked to "predict" an outcome or "explain" a process. Correct responses require using vocabulary flexibly and with meaning. To this end, *everything* you submit must be in your own voice. The "own voice" standard is a higher bar than simply 'did not plagiarize'; direct quotations and paraphrasing are incompatible with this standard. Student will have an opportunity for a replacement assignment and grade for a first own-voice violation. Additional submissions that do not meet this standard cannot be considered for credit.

¹ Please use course materials to complete course work. If you identify another resource that you find helpful, please verify its validity (for example by sharing it with the instructor.)

² I am in the process of migrating this course away from expensive textbooks to 100% open access resources. Some of the materials I've previously generated for this course still describe content from the Carlson textbook even though all topics are covered in the assigned (open access aka free) resources.

How to meet the "Own Voice" Standard:

- Take careful notes: identify the source of the notes at the top of the page; do not copy down words or phrases directly from the source.
- Avoid looking at notes while you craft your answers. Being able to speak from memory is a great way to demonstrate to yourself that you've mastered the content and are using your own voice.
- Read your answers aloud. Does it sound like something you would say? Do you understand every word you've written? If not, you likely haven't mastered the content and don't meet the standard.
- Google your answers: Does something come up that looks similar to what you (or a teammate) have written? If so, you likely haven't answered the question correctly and not met the standard.
- Ask Questions: Are you unsure what a question is asking? Unclear about how to approach the topic? Is the topic perplexing to you? Use the discussion board. Is the discussion board not helping? Make an office hours appointment with Flandreau!

Late-Assignment Policy: To a certain degree, this course is self-paced. Please spend some time with the calendar at the start of the term, identify any potential schedule conflicts, and make arrangements with me as needed. Staying on top of the schedule is critical for this course because the material builds on itself. Please contact me ASAP if you feel yourself falling behind so we can come up with a plan together.

- Nearly all assignments (exceptions = surveys and tests) will be available at the start of the semester and can be submitted early. Please plan ahead and leave enough time to account for internet issues, blackboard issues, and last-minute things that pop up in our schedules.
- Assignments with a Friday 11:59pm deadline will still be graded if submitted by 11:59pm Sunday.
- Some assignments will still be available to submit after the deadline / grace period has passed. I still recommend completing these assignments because they are designed to help you learn the material. However, I *cannot* guarantee that late assignments beyond the grace period will be graded or receive feedback. *Please set up a 1:1 with me to discuss*.

HOW AM I GRADED?

Assessments include weekly quizzes targeting the basic levels of <u>Bloom's taxonomy</u> (understand and remember) as well as review assignments targeting the base-to-mid levels (understand, remember, apply, analyze). Other grades are based on completion, including surveys designed to foster <u>metacognition</u>. Exams will likely include multiple choice, matching, and fill-in the blank questions as well as short answer and essay questions designed to target the mid-to-top levels of Bloom's taxonomy (Apply, Analyze, Evaluate, Create).

How you personally are graded depends on which pathway you choose:

- 1. Option #1: Collaborative Pathway. Reasons why you might want to choose this option:
 - I (Flandreau) HIGHLY recommend the collaborative pathway because there's strong evidence supporting improved learning outcomes. If you plan for a career in a neuroscience-related field (or even just plan on taking PSY 435), this is the BEST way to develop a deep understanding of course content.
 - You prefer to work with the same people all semester, want a built-in support system / study group for the semester with people you can count on.
 - You want your effort to count toward your grade and / or do not want tests to be weighted as heavily in the final grade
- 2. Option #2: Independent Pathway. Reasons why you might want to choose this option:
 - You have a schedule that makes it difficult to meet with a team either due to lack of flexibility or changing routine each week.
 - You don't want to be graded on your effort and are okay with tests accounting for a larger portion of the total grade.

ONLINE ASYNCH PSY 330 FLANDREAU	Collaborative Pathway		Independent Pathway	
Assignment	Points (Each)	Points (Total)	Points (Each)	Points (Total)
"Are you ready" Quiz (n = 1)		10	10	10
Own voice and citation quiz (n = 1)		15		15
Content Quizzes (9 on the schedule; 8 count towards grade; these focus on individual topics but ARE CUMULATIVE; complete with team for collab pathway)	15	120	20	160
Individual meeting with Flandreau		(Optional)	5	5
Reflection Surveys (n = 4; graded based on completion)	5	20	5	20
Team meeting with Flandreau		5		
Contribution to Team (determined by self, peer, and instructor evaluation at mid- and end of semester time points.)	25	50		
On-time completion of team assignment survey		5	N/A	N/A
Team contract		5		
On-time completion of team evaluation surveys	5	10		
Test 1		75		90
Test 2 (Cumulative)		85		100
Total		400		400

Please note what each grade means

А	Your work is exceptional. You thoughtfully and creatively demonstrate deep understanding of the key concepts and ideas, surpassing course expectations. You relate your learning to prior knowledge, explicitly recognized implications of these ideas/concepts and their application. Your work generates little critique and exceeds ALL criteria for assignments and the course.
A- / B+	Your work is very well done. You utilize feedback and demonstrate you are developing and deepening your understanding of key concepts. Your work generates few questions/critiques and meets all and exceeds most (A-) or some (B+) criteria for assignments and the course.
В	Your work meets all criteria for the assignments and course. There is evidence of a deepening understanding and an effort and commitment to thinking critically about the ideas, concepts, and topics as they might be applied in practice.
B-	Your work meets all criteria for the assessment and/or the course. You include nearly all necessary pieces/parts and adequately address each aspect of the expectations that have been conveyed to you. Your work demonstrates mastery in nearly all targeted areas of competency.
С	Your work includes evidence that feedback on prior assessments and experiences (i.e. discussions, tasks, etc.) in class have been thoughtfully applied. Some criteria are only partially addressed or has pieces missing, but your work is acceptable.

Grade Cut Offs: A (93%), A- (90%), B+ (87%), B (83%), B- (80%), C+ (77%), C (73%), C- (70%), D+ (67%), D (60%). Your peers in this course are your support system, not your competition. Grades are not curved or rounded.

Description of Graded Items

- 1. Are you ready quiz: Basically a syllabus quiz. It's boring. It's important. Class doesn't really function if we don't all know the policies and expectations _(\mathcal{\m
- 2. Own Voice & Citation Quiz: A low-stakes way to practice the own-voice method and make sure we're on the same page leading up to larger assignments.
- 3. <u>Content Quizzes</u>: Hits the lowest two stages of <u>Bloom's Taxonomy</u> (Remember & Understand). Can be thought of as a vocabulary test. While these quizzes *focus* on a specific topic, they ARE cumulative because the course material builds on itself. In preparation for these quizzes, please study connections across topics. *If you are in the collaborative pathway, these should be done as a team.*
- 4. <u>Meeting with Flandreau</u>: Although we aren't meeting regularly, it's still valuable to get to know each other a bit. Set up meetings using the calendly link. At least one per semester is required. Can be completed as a team for collab path students.
- 5. <u>Reflection Surveys</u>: An evidence-based strategy for students to think intentionally about their approach to the course and the best way for me to keep track of how things are going from your perspective.
- 6. <u>Tests 1 and 2</u>: Questions designed for the top 4 levels of Bloom's (Apply, Analyze, Evaluate, & Create).
- 7. <u>Final Exam</u>: Students *may* have the option of a final exam beyond test 2 as one last opportunity to demonstrate that you have met all the learning objectives. Your score on this test would replace the lowest of either test 1 or test 2. *Please set up a 1:1 with me prior to week 12 to discuss.*

RESOURCES

Flandreau: I strive to maximize inclusivity and opportunities for each student to reach their highest potential. My goal is for each student to masters all learning objectives for the semester. I've curated resources and designed assessments to guide everyone toward that goal. **One of the most important resources for this course is me!!** In addition to watching my online lecture videos, participating in classes, responding to feedback, etc., please also visit me in office hours. These 1:1 meetings can be used to ask questions about course content, grades, academic and career choices. https://calendly.com/flandree/flandreau-office-hours

Library Resources: The GVSU library has additional resources related to understanding and producing scientific writing as well as important information on how to cite sources and avoid plagiarism. https://www.gvsu.edu/library/km/

Official Accommodations: Please work with DSR (https://www.gvsu.edu/dsr/) and communicate with me (preferably during the first week of the semester) to make sure your needs are met in this course. If you have a DSR form, please upload to the designated location on BB.

Health, Safety, & Academic Success

We all have different learning preferences and deal with different personal situations, some related to the COVID-19 pandemic and social injustice. Many of us are dealing with childcare, eldercare, or other requirements. No one can reach their greatest academic potential if basic needs are not met. Please visit the following sites for information on resources related to access to food, housing, internet and software and mental health.

- https://www.gvsu.edu/coronavirus/resources-for-students-22.htm
- https://www.gvsu.edu/financialaid/financial-hardship-requests-226.htm
- University Counseling Center
- https://www.gvsu.edu/care/
- https://www.gvsu.edu/inclusion/remote-services-156.htm

If there are aspects of this course that prevent you from learning or exclude you, please let me know ASAP so that we can work together.

SCHEDULE

The specific daily tasks are more of a recommendation. However, the deadlines should be adhered to. All Friday deadlines have a 48hr grace period.

PART 1 (Weeks 1 – 6)

SCHEDULE		Module	TOPIC	Due Online		
WEEK 1	Mon	29-Aug				
	Tues	30-Aug	0	Intro		
	Wed	31-Aug				
	Thurs	1-Sep	0	Bio Basics		
	E:	2 0			Are you ready quiz	
	Fri	2-Sep			Optional EC Pre-Test	
WEEK 2	Mon	5-Sep		Labor day		
	Tues	6-Sep	1	Neuroanatomy		
	Wed	7-Sep				
	Thurs	8-Sep	2	Vm, Driving Forces		
					QUIZ 1 (Bio Basics, Neuroanatomy)	
	Fri	9-Sep			Reflection Survey 1;	
					Team Assignment Survey (Collab Path)	
WEEK 3	Mon	12-Sep				
	Tues	13-Sep	2	AP; Myelin		
	Wed	14-Sep				
	Thurs	15-Sep	3	Synapse Structure, NT Release		
	Fri 16-So	16.0			QUIZ 2 (Communication within Neurons)	
		16-Sep			Own Voice & Citation Practice Quiz	
WEEK 4	Mon	19-Sep				
	Tues	20-Sep	3	Postsynaptic Receptors		
	Wed	21-Sep				
	Thurs	22-Sep	4	Circuits and Reflexes		
					Team Contract (Collab Path); QUIZ	
	Fri	23-Sep			3 (Communication between neurons)	
WEEK 5	Mon	26-Sep				
	Tues	27-Sep	5	Psychopharmacology		
	Wed	28-Sep				
	Thurs	29-Sep	5	Neurotransmitters		
	Fri	30-Sep			QUIZ 4 (Circuits and Reflexes)	
WEEK 6	Mon	3-Oct				
	Tues	4-Oct	0-5	Review		
	Wed	5-Oct				
	Thurs	6-Oct	0-5	Test 1		
	Fri	7-Oct			TEST 1 (Modules 0 - 5)	

Part 2 (Weeks 7 – 15)

rait 2 (w		,	Module	TOPIC	Due Online
WEEK 7	Mon	10-Oct			
	Tues	11-Oct	6	Retina	
	Wed	12-Oct			
	Thurs	13-Oct	6	Vision in brain	
					Team Eval Survey #1 (Collab Path)
	Fri	14-Oct			Reflection Survey 2
WEEK 8	Mon	17-Oct			
	Tues	18-Oct	7	Somatosensation	
	Wed	19-Oct			
	Thurs	20-Oct	7	Pain	
	Fri	21-Oct			QUIZ 5 (Vision)
WEEK 9	Mon	24-Oct		Fall break	
	Tues	25-Oct		Fall break	
	Thurs	27-Oct	0-7	Review	
	Fri	28-Oct			QUIZ 6 (Somatosensation & Pain)
WEEK 10	Mon	31-Oct			
	Tues	1-Nov	8	Learning, Memory	
	Wed	2-Nov			
	Thurs	3-Nov	8	Amnesia	
	Fri	4-Nov			Reflection Survey 3
WEEK 11	Mon	7-Nov			
	Tues	8-Nov	9	Genetics	
	Wed	9-Nov			
	Thurs	10-Nov	9	PD	
	Fri	11-Nov			QUIZ 7 (Learning, Memory, Amnesia)
WEEK 12	Mon	14-Nov			
	Tues	15-Nov	9	HD	
	Wed	16-Nov			
	Thurs	17-Nov	0-9	Review	
	Fri	18-Nov			QUIZ 8 (Genetics & Degenerative Disorders)
WEEK 13	Mon	21-Nov			
	Tue	22-Nov	10	Schizophrenia	
	Thurs	24-Nov		Thanksgiving	
	Fri	25-Nov	_		
WEEK 14	Mon	28-Nov			
	Tues	29-Nov	10	Schizophrenia Treatment	If you haven't already done so, please be sure to
	Wed	30-Nov			complete your required meeting with Flandreau
	Thurs	1-Dec	0-10	Review	
	Fri	2-Dec			QUIZ 9 (Schizophrenia)
WEEK 15	Mon	5-Dec			
	Tues	6-Dec	0-10	Study!	
	Wed	7-Dec			
	Thurs	8-Dec	0-10	Test 2	
					TEST 2 (Modules 0 - 10)
	Fri	9-Dec			Reflection Survey #4
	111)-Da			Team Eval Survey #2 (Collab Path);
					Optional EC Post Test