

FIU – Department of Psychology
PSB4002 – U01C – Introduction to Biopsychology

CLASS MEETINGS

Tuesday/Thursday 12:45 – 2:30 pm (SIPA 220)

INSTRUCTOR

Dr. Eliza Nelson

Office Hours: Tuesday/Thursday 11:00 am – 12:00 pm (DM 276)

Email: elnelson@fiu.edu

GRADUATE TEACHING ASSISTANT

Emily Boeving

Office Hours: Wednesdays 3:00 – 5:00 pm (DM 269A)

Email: eboev001@fiu.edu

Note: You do not need an appointment to come to office hours. We are available in our offices during the posted times and see students on a first-come, first-serve basis. If you cannot make it during the posted times, please email us to make an appointment. If you are struggling with the material, we want to see you! Do not wait until it's too late in the semester to get help!

EMAIL POLICY

Please address your email “Dear Dr. Nelson” or “Dear Emily” and sign your name at the bottom. We reserve the right not to respond to ‘hey you’ or otherwise unprofessional emails. Blackboard does not alert us to messages; do not use the Blackboard system to contact us. Typically, we will respond to email within 1 day (elnelson@fiu.edu or eboev001@fiu.edu).

CLASSROOM POLICIES

Please be respectful of class time and of your peers. Kindly refrain from talking, texting, or using technology for non-class related activities. If you are disruptive, we reserve the right to ask you to leave. Arriving late and leaving early is distracting for everyone; please don't do it. **Keep in mind that you cannot turn in your CPA if you arrive to class after the 10-minute grace period.**

COURSE GOALS

This course is an introduction to the biological foundations of behavior and is divided into four parts: (1) the neural foundations of behavior, (2) motivation and emotion, (3) sensory systems, and (4) complex behavior. Topics include nervous system organization, drugs and addiction, movement, learning and memory, psychological disorders, and sleep and consciousness.

By the end of the course, you will be able to:

- Describe and explain how the nervous system works
- Critically discuss the reciprocal relationship between biology and psychology
- Understand typical and atypical brain-behavior relationships

REQUIRED TEXT

- *Brain & Behavior: An Introduction to Biological Psychology, 4th edition* (© Garrett)
- **Do not buy a previous edition. Make sure you have the 2015 version.**
- **The online resources for this textbook are free: <https://edge.sagepub.com/garrett4e>**
- **PowerPoint slides are not a substitute for reading the textbook.**

RECOMMENDED TEXT

- *Study Guide to Brain & Behavior 4th edition* (© Hough)
- **You can purchase the study guide for \$5 if you buy the bundle in the FIU bookstore.**
- **The study guide costs ~\$30 when purchased separately through online retailers.**

DISABILITY ACCOMODATIONS

Disability students must submit DRC paperwork in the first week of class for accommodations: drc.fiu.edu/students

ACADEMIC INTEGRITY

Any instance of academic misconduct (e.g., plagiarism, cheating, collusion, dishonesty) will be reported to the University and Department of Psychology for further action. Please refer to your student handbook, or ask me if you are unsure about what constitutes misconduct. Details can also be found at this website: https://ugrad.fiu.edu/academic_misconduct/

The policy for this course is an automatic “0” for academic misconduct on an exam.

You may not work together with another student on Course Preparation Assignments (CPAs). You must write CPAs in your own handwriting and your own words to receive credit.

COURSE PREPARATION ASSIGNMENTS (CPAs)

For each lecture, there is a course preparation assignment (CPA) due. The CPA is 1 question based on the assigned chapter for that day. Your answers must be handwritten in your own words and should be ½ - 1 page. The CPA is due at the start of class – no exceptions. You may not turn in the CPA late (i.e., it cannot be completed during lecture). There is a 10-minute grace period to get your CPA turned in on time in the event of a parking/weather mishap. This grace period means that after 12:55 pm, your CPA is late and will not be accepted. CPAs are graded pass/fail on effort. Students are not permitted to work together on CPAs.

CPAs are directly tied to your final grade. For a student to get a particular course grade, s/he must meet or exceed each category of work (CPAs and Major Exams). For example, if a student gets an A average on the exams, but earns credit for only 75% of the CPAs, s/he will receive a C in the course. If a student earns credit for 90% of the CPAs, but gets a C average on the exams, s/he will also receive a C in the course. You cannot skip class and expect to pass.

An “A” student does “A” work on exams and comes to class prepared at least 90% of the time.

NON-CUMMULATIVE EXAMS

There are 3 in-class exams worth 100 points each. *Any material covered during the dates for each exam is fair game including, but not limited to, readings, slides, videos, and guest lectures.* The format for exams may include multiple choice, matching, true or false, and short answer. Once an exam has been turned in, you will not be allowed to take the test if you arrive late.

There are no make-ups for exams without dated documentation of an excused absence. Family vacation is not an excused absence.

Exam 1 = June 4 th	100 pts	Material from 5/12 – 6/2
Exam 2 = July 2 nd	100 pts	Material from 6/9 – 6/30
Exam 3 = July 30 th	100 pts	Material from 7/7 – 7/28

Your exam scores are averaged at the end of the course. You must meet or exceed your CPAs.

GRADING

Course Grade	CPAs	Exam Average
A	Credit on $\geq 90\%$ (18-20/20)	"A" average (90-100)
B	Credit on $\geq 80\%$ (16-17/20)	"B" average (80-89)
C	Credit on $\geq 70\%$ (14-15/20)	"C" average (70-79)
D	Credit on $\geq 60\%$ (12-13/20)	"D" average (60-69)
F	Credit on $< 60\%$ (0-10/20)	"F" average (below 60)

You cannot pass the course if you do not attend lecture and turn in your CPAs on time. Attendance is not optional. You also will not pass the course if you do poorly on exams. You will earn your exam average as long as you meet or exceed that level of CPA credit.

MAKE-UP POLICY

Make-up work is only permitted for excused absences with documentation. This includes, but is not limited to, doctor's excuses (for yourself or immediate relatives), athletic events, FIU-related scholarly events (e.g., conference), death in the family, religious observances, or auto accident (not a traffic jam). Work-related excuses will be handled on a case-by-case basis. Approved work-related excuses are one-time absences, not regular occurrences. Vacation is not a one-time occurrence. Weather is not an excused absence. Traffic and parking are not excused absences. Please do not take this class if it conflicts with your work schedule. Also, keep in mind that documentation must be dated for the assignment or exam that you missed. As soon as you are able, contact Dr. Nelson directly by email to discuss your situation. Emily cannot excuse absences or adjust grades.

If you miss a lecture for any reason, we strongly encourage you to come to office hours, or make an appointment with Dr. Nelson or Emily to go over the material that you missed.

EXTRA CREDIT POLICY

There are two ways to earn extra credit in this course: (1) Answering bonus questions correctly on exams and (2) Completing article assignments. For each chapter, there are accompanying articles on the SAGE textbook website (<https://edge.sagepub.com/garrett4e>). For each article, there is a set of posted questions (typically 3 per article). You must answer all the questions for the article you chose. Responses are grade on effort. You are allowed to do 1 article per chapter. If you do an article from all 15 chapters, you can drop your lowest exam grade. Extra credit will post to a separate column in your gradebook on Blackboard so that you can track it throughout the semester. You can earn 1 point per question. If you do 1-14 article assignments, the points are added to your lowest exam score at the end of the semester.

Extra credit can be turned in any time, but the deadline is Thursday 7/30 at the start of class. No late extra credit assignments will be accepted. There is no exemption to this policy, and no other options to improve your grade in the course. Do not ask for a grade adjustment.

LECTURE SCHEDULE

Subject to change. All readings and CPAs are due on the date indicated.

	TUESDAY	THURSDAY
Week 1	05/12: Chapter 1 No CPA Due	05/14: Chapter 2 CPA #01
Week 2	05/19: Chapter 3 CPA #02	05/21: Chapter 4 CPA #03
Week 3	05/26: Chapter 5 CPA #04	05/29: Continued CPA #05
Week 4	06/02: Chapter 6 CPA #06	06/04: EXAM 1 <i>Chapters 1-6 & Material 5/12-6/02</i>
Week 5	06/09: Chapter 7 CPA #07	06/11: Chapter 8 CPA #08
Week 6	06/16: Chapter 9 CPA #09	06/18: Chapter 10 CPA #10
Week 7	06/23: Continued CPA #11	06/25: Chapter 11 CPA #12
Week 8	06/30: Continued CPA #13	07/02: EXAM 2 <i>Chapters 7-11 & Material 6/09-6/30</i>
Week 9	07/07: Chapter 12 CPA #14	07/09: Chapter 13 CPA #15
Week 10	07/14: Chapter 14 CPA #16	07/16: Continued CPA #17
Week 11	07/21: Chapter 15 CPA #18	07/23: Continued CPA #19
Week 12	07/28: Catch-up CPA #20	07/30: EXAM 3 <i>Chapters 12-15 & Material 7/07-7/28</i>

LIST OF CPAs (questions come from “For Further Thought” found at the end of each chapter)

CPA #01 [Chapter 2]

1. Imagine what the effect would be if the nervous system used only one neurotransmitter.

CPA #02 [Chapter 3]

1. What strategy do you think has the greatest potential for restoring function in brain-damaged patients? Why?

CPA #03 [Chapter 4]

1. Do you think the rights of humans and animals are adequately protected in research? Why or why not? What do you think would be the effect of eliminating the use of animal subjects?

CPA #04 [Chapter 5]

1. Is it morally right to treat addictions with drug antagonists, aversive drugs, and antidrug vaccines? Is your opinion the same for drug agonists?

CPA #05 [Chapter 5]

1. You work for an agency that has the goal of substantially reducing the rate of drug abuse in your state through education, family support, and individualized treatment. Based on your knowledge of addiction, what should the program consist of?

CPA #06 [Chapter 6]

1. Several of the controls of eating seem to duplicate themselves. Is this wasteful or useful? Explain.

CPA #07 [Chapter 7]

1. Do you think the cognitive differences between males and females will completely disappear in time? If not, would they in an ideal society? Explain your reasons.

CPA #08 [Chapter 8]

1. Stress and pain involve considerable suffering, but they are necessary. Explain. What makes the difference between good and bad stress and pain?

CPA #09 [Chapter 9]

1. Make the argument that chimps possess language, though at a low level. Then argue the opposite, that their behavior does not rise to the level of language.

CPA #10 [Chapter 10]

1. Explain why the visual system analyzes an object's edges, texture, and color and then detects the object, instead of the other way around.

CPA #11 [Chapter 10]

1. Cones in the bird retina detect blue, green, red, and ultraviolet. Can you imagine what they might gain from detecting ultraviolet reflections from objects in their environment?

CPA #12 [Chapter 11]

1. Imagine a robot with a humanlike body. It is programmed to walk, reach, grasp, and so on. It has visual and auditory capacities, but no body senses. What would its movement be like?

CPA #13 [Chapter 11]

1. Judging by the examples given of movement disorders, what are the points of vulnerability in the motor system?

CPA #14 [Chapter 12]

1. Which direction of research for the treatment of Alzheimer's do you think holds the greatest promise? Why?

CPA #15 [Chapter 13]

1. As you look at autism and ADHD, you see several similarities in the causes. Why, for example, do you think one child exposed to organophosphate pesticides would develop ASD and another would be diagnosed with ADHD?

CPA #16 [Chapter 14]

1. Now that we are nearing the end of the text, summarize what you know about the interaction of heredity and environment. Give examples from different chapters and include the concept of vulnerability.

CPA #17 [Chapter 14]

1. Give an overall view of what produces deviant behavior (going back to earlier chapters as well as this one). What effect does this have on your ideas about responsibility for one's behavior?

CPA #18 [Chapter 15]

1. Machines and probably, some simpler animals function just fine without awareness. Awareness probably places a significant demand on neural resources. What adaptive benefits do you see?

CPA #19 [Chapter 15]

1. Do you think we will be able to understand consciousness at the neural level? Why or why not?

CPA #20 [Wrap-up]

1. What was your favorite topic from this semester, and why?