

PSYC 373: Biopsychology Lab (2 credits)
Sections 204 and 206
Fall 2020 - ONLINE

Instructor: Paul Beatty
Email: pbeatty@gmu.edu
Class time and location: Online
Virtual Office Hours: By Appointment
(Please email to request virtual office hours)

Last day to add is August 31. Last day to drop with 100% tuition refund is September 8. Last day to drop with 50% tuition refund is September 15. Unrestricted withdrawal period September 16 – September 28 Selective withdrawal period September 29 - October 28.

Recommended Prerequisites: PSYC 372 or 375, or permission of instructor. Concurrent enrollment is also permitted.

COURSE DESCRIPTION

Biopsychology is a biological approach to understanding behavior and mental processes. The study of nervous system structure and function is a key part of biopsychology. The primary goal of this lab is for students to become familiar with the location and function of various brain structures through short lectures and hands-on dissections. The last part of the semester will introduce students to behavioral and cognitive neuroscience research approaches.

This course will consist of a series of lecture/demonstration videos, dissections, weekly assignments, quizzes, and lab practicals. The dissections are to be completed at home using the purchased dissection kits. All work is to be submitted online via Blackboard. The course is asynchronous, meaning that you may complete all assigned tasks at your own pace (i.e., there are no required virtual or in- person meeting times). However, there are weekly deadlines. All course tasks are described in detail below.

BLACKBOARD LOGIN INSTRUCTIONS

Access to MyMason and GMU email are required to participate successfully in this course. Please make sure to update your computer and prepare yourself to begin using the online format BEFORE the first day of class. Check the IT Support Center website. Navigate to the Student Support page for help and information about Blackboard. In the menu bar to the left you will find all the tools you need to become familiar with for this course. Take time to learn each. Make sure you run a system check a few days before class. Become familiar with the attributes of Blackboard and online learning.

REQUIRED MATERIALS

Use this link to order your kit:

<https://www.carolina.com/catalog/detail.jsp?prodId=582286>

***For students on financial aid: The bookstore is not carrying this kit. If you wish to use financial aid to obtain the kit, you will need to include the amount of the kit (\$86.40 including tax + shipping) in your requested financial aid amount. You can then purchase the kit with the refund you receive.

Upon receiving your kit, please be sure to check your kit, using the packing list for all required items. If anything is missing or broken contact Customer Service at 1-800-334-5551 (7:30am – 8:00pm M-F) or Customer_service@carolina.com within 24 hours upon receipt. Kits can only be returned if they are unopened and still sealed.

For this course you will need a customized dissection kit that includes all of the materials needed to complete the hands-on portion of PSYC 373.

****International students will need to contact Tina Mansfield directly to place your order. Tina can be reached at 1-800-334-5551, ext. 4371, or Tina.Mansfield@carolina.com.*

You will also need the following:

- Pack or container of 70% isopropyl alcohol wipes (for wiping hands/gloves/surfaces) (example: <https://www.cvs.com/shop/cvs-health-isopropyl-rubbing-alcohol-70-wipes-40ct-prodid-1170225>)
- Digital camera or mobile device (e.g. phone) capable of taking photos
- Paper towels
- Two twist ties, rubber bands or clips (may be needed to secure specimen storage bags)

OPTIONAL TEXTBOOK Cooley, R.K., & Vanderwolf, C.H. (2001). *The Sheep Brain: A Basic Guide*. A.J. Kirby Co.: London. ISBN 978-0920700013

COURSE LEARNING OUTCOMES

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

- Describe the basic layout and major divisions of the nervous system.
- Locate the major structures of the mammalian brain and eye.
- Describe the function of major brain and eye structures as they relate to behavior and cognition.
- Analyze and interpret results from guided activities using online simulations or datasets.

TECHNOLOGY REQUIREMENTS

Hardware: You will need access to a Windows or Macintosh computer with at least 2 GB of RAM and access to a fast and reliable broadband internet connection (e.g., cable, DSL). A larger screen is recommended for better visibility of course material. You will need speakers or headphones to hear recorded content and a headset with a microphone is recommended for the best experience. For the amount of Hard Disk Space required taking a distance education course, consider and allow for: the storage amount needed to install any additional software and space to store work that you will do for the course.

If you consider the purchase of a new computer, please go to [Technology Buying Guide](#) to see recommendations.

Software: Many courses use Blackboard as the learning management system. You will need a browser and operating system that are listed compatible or certified with the Blackboard version available on the myMason Portal. See supported browsers and operating systems. Log in to myMason to access your registered courses. Some courses may use other learning management systems. Check the syllabus or contact the instructor for details. Online courses typically use Acrobat Reader, Flash, Java, and Windows Media Player, and/or Real Media Player. Your computer should be capable of running current versions of those applications. Also, make sure your computer is protected from viruses by downloading the latest version of Symantec Endpoint Protection/Anti-Virus software for free [here](#).

Students owning Macs or Linux should be aware that some courses might use software that only runs on Windows. You can set up a Mac computer with Boot Camp or virtualization software so Windows will also run on it. Watch this video about using Windows on a Mac. Computers running Linux can also be configured with virtualization software or configured to dual boot with Windows.

Note: If you are using an employer-provided computer or corporate office for class attendance, please verify with your systems administrators that you will be able to install the necessary applications and that system or corporate firewalls do not block access to any sites or media types.

Course-specific Hardware/Software

Check the syllabus for your course or contact the instructor prior to the start of the course to find out about specific technical requirements for your class. Hardware or software required for your course or program may be available for purchase at Patriot Computers (the University's computer store that offers educational discounts and special deals).

- A webcam (built in to your computer or a portable one that can be externally mounted) for taking exams using Respondus Monitor.
Enough space on your computer to:
 - 1) Install the required and recommended software
 - 2) Save your course assignments.
- Respondus LockDown Browser (download from the myMason home page)
- Kaltura CaptureSpace Desktop Recorder (download from the MyMedia tab on the myMason home page)

COURSE SCHEDULE *NOTE:* You are responsible for knowing about all announcements and any syllabus modifications made via Blackboard and/or email.

ASSIGNMENT DESCRIPTIONS

Lab Reports: You will complete a total of 9 lab reports (and 1 worksheet, which will be included in this grading category) throughout the session. Some will be based on the brain and eye dissections while others will be based on online simulations, datasets or activities. Together the lab reports (and 1 worksheet) are worth 50% of your final grade.

Lab Report Peer Reviews/Discussions: You will submit a draft of your lab report on the Friday of the week in which the lab activity is completed. You will then have the opportunity to either discuss the report with classmates OR review each other's drafts and revise your report based on comments, depending on the specific week. Comments on your peers' work must be submitted by the Monday after the draft is due. You will then submit a final draft of your report by the following Monday (1 week after comments due). Points earned from participating in the peer reviews/discussions will account for 5% of your grade.

Quizzes: There are a total of 4 quizzes during the first half of the session. The syllabus and lab safety quizzes can be taken an unlimited number of times. The other two quizzes can only be taken once. The quizzes will be based on material covered in the module videos. Each quiz will consist of 10 multiple choice questions. Quizzes are open book/note and timed. Together the quizzes are worth 10% of your final grade.

Lab Practical Exams: These two non-cumulative practical exams will be used to test your knowledge of the location and function of brain/eye structures covered in the dissections. “Mock practicals” will be available on Blackboard for practice a few days before. The mock practicals will not be graded. Practical I will cover Brain Tours I & II and is worth 15% of your final grade. Practical II is cumulative and worth 20% of your final grade.

GRADING SCALE

Breakdown: Lab Reports (50%) + Peer Reviews/Discussions (5%) + Quizzes (10%)+ Practical Exam 1 (15%) + Practical Exam 2 (20%) = 100%

Grades will be assigned based on the following scale:

A+ 97% or above	A 93-96%	A- 90-92%
B+ 87-89%	B 83-86%	B- 80-82%
C+ 77-79%	C 73-76%	C- 70-72%
D 60-69%	F 59% & below	

COURSE POLICIES

Attendance: This is an online class and attendance is treated differently from traditional classrooms. You will be presented with multiple avenues for accessing instructional materials and interaction, from completing individual assignments to participating in group activities. You should strive to keep up with the assignments that show that you are “attending” and participating.

Group/Class Participation: Most weeks of the semester will require interaction with your classmates in some way. You are expected to contribute to a collegial atmosphere by being respectful to the instructor and your classmates at all times. This includes refraining from the use of inappropriate materials, foul language, and anything that could be construed as disrespectful of marginalized groups.

Make-up policy: Lab reports, peer reviews/discussions, and quizzes submitted after the deadline will be given a grade of zero, and makeups will not be allowed. Late practical exams will only be permitted with medical or similar documentation and will generally incur a grade penalty of 10% per day.

Students who provide written medical or similar documentation explaining an inability to complete course requirements for an extended period of time may be allowed to make up certain types and amounts of coursework at my discretion.

Students are responsible for checking the GMU Academic Calendar and making sure they are available to complete coursework throughout the entire summer session. For an online course this means ensuring you have reliable Internet access from beginning

to end. *Practical exams and other work may not be postponed due to travel occurring during the semester, whether planned or not; nor can the practical exams be taken earlier than the scheduled timeframe.*

Instructor-Student Communication: I will do my best to respond to your emails within 24 hours. If I will be away from email for more than one day, I will post an announcement in Blackboard/via email. Feel free to respond to other students in the Ask the Professor forum if you know the answer.

Course Technology Use: Several Internet-related materials are required for access to and success in this course, including the following:

- A hard-wired, high-speed Internet connection: Non-stable or slow Internet connections will not excuse failures to complete any assignments or exams by dates due.
- A functioning gmU.edu e-mail account: Personal e-mail accounts will not suffice for correspondence for this course, as you will only be contacted via their GMU-affiliated e-mail addresses.

Downloading capability: You must have regular access to a computer onto which they can download and use the Exam Guard browser for testing throughout the course.

Microsoft Office: Word access: You must have regular access to a computer onto which they can create, save, and submit written assignments in (.doc) or (.docx) format.

Blackboard familiarity: This course is delivered and conducted entirely online via the GMU Blackboard. As registrants in this course, you can (a) access the Student Tutorial or (b) contact the Help Desk or (c) refer to the Tech Support tab in the upper- right-hand corner of the course site for more information. You can find the following on BB:

Course materials: Various course materials (syllabus, reading materials, notes, guidelines/grading criteria for assignments, projects, and proposal) are/will be available from this site.

Official Communications via GMU E-mail: Mason uses electronic mail to provide official information to students. Examples include communications from course instructors, notices from the library, and notices about academic standing, financial aid information, class materials, assignments, questions, and instructor feedback. You are responsible for the content of university communication sent to their Mason e-mail account and are required to activate that account and check it regularly.

Class Cancellation Policy: Please check blackboard and your email regularly. If class is cancelled, I will notify you by email/blackboard and how we will make the time up.

Tentative Course Schedule:

WEEKS	CONTENT	ASSIGNMENTS DUE BY 11:59 pm on date
Week 1 Tue 8/25 - Mon 8/31	Course Orientation	Mon 08/31: Syllabus Schedule Quiz Make sure you have your Lab Supplies
Week 2 Tue 9/1 - Mon 9/7	Introduction to Neurophysiology	Fri 9/4: Neurophysiology Quiz Lab Report 1 Draft and Disc. Post Mon 9/7: Lab Report 1 Peer Disc. Comments
Week 3 Tue 9/8 - Mon 9/14	Layout of the Nervous System/Lab Safety	Fri 9/11: Nervous System Worksheets Layout of the Nervous System Quiz Lab Safety Quiz Mon 9/14: Lab Report 1 Final
Week 4 Tue 9/15 - Mon 9/21	Brain Tour I (Dissection)	Fri 9/18: Lab Report 2 Draft and Disc. Post Mon 9/21: Lab Report 2 Peer Review Comments
Week 5 Tue 9/22 - Mon 9/28	Brain Tour II (Dissection)	Fri 9/25: Lab Report 3 Draft and Disc. Post Mon 9/28: Lab Report 3 Peer Review Comments Lab Report 2 Final
Week 6 Tue 9/29 - Mon 10/5	Lab Practical 1 Opens 12 am Tue 9/29	Mon 10/5: Lab Report 3 Final Lab Practical 1
Week 7 Tue 10/6 - Mon 10/12	Visual System	Fri 10/9: Visual System Quiz Lab Report 4 Draft and Disc. Post Mon 10/12: Lab Report 4 Peer Disc. Comments

WEEKS	CONTENT	ASSIGNMENTS DUE BY 11:59 pm on date
Week 8 Tue 10/13 - Mon 10/19	Eye Dissection	Fri 10/16: Lab Report 5 Draft and Disc. Post Mon 10/19: Lab Report 5 Peer Review Comments Lab Report 4 Final
Week 9 Tue 10/20-Mon 10/26	Midsagittal Dissection	Fri 10/23: Lab Report 6 Draft and Disc. Post Mon 10/26: Lab Report 6 Peer Review Comments Lab Report 5 Final
Week 10 Tue 10/27-Mon 11/2	Coronal Dissection	Fri 10/30: Lab Report 7 Draft and Disc. Post Mon 11/2: Lab Report 7 Peer Review Comments Lab Report 6 Final
Week 11 Tue 11/3-Mon 11/9	Lab Practical 2 Opens at 12 am Tue 11/3	Mon 11/9: Lab Report 7 Final Lab Practical 2
Week 12 Tue 11/10-Mon 11/16	<i>Behavioral</i> Neuroscience Methods	Fri 11/13: Lab Report 8 Draft and Disc. Post Mon 11/16: Lab Report 8 Peer Disc. Comments
Week 13 Tue 11/17-Mon 11/23	<i>Cognitive</i> Neuroscience Methods	Fri 11/20: Lab Report 9 Draft and Disc. Post Mon 11/23: Lab Report 9 Peer Disc. Comments Lab Report 8 Final
Week 14 Tue 11/24-Mon 11/30	Thanksgiving Break - NO CLASS	
Week 15 Tue 12/1-Mon 12/7	Catch-Up Class Turn in Remaining Assignments	Mon 12/7: Lab Report 9 Final

UNIVERSITY POLICIES AND RESOURCES

Academic Integrity: Academic integrity refers to honest and ethical behavior in all aspects of academic activity. This includes: not cheating on exams or homework assignments (e.g., copying the work of others or using crib notes), not passing off someone else's ideas as your own (plagiarism), not engaging in dishonesty of any kind with regard to your class participation and assignments.

Honor Code: George Mason University has an Honor Code, which requires all members of this community to maintain the highest standards of academic honesty and integrity. Cheating, plagiarism, lying, and stealing are all prohibited. All violations of the Honor Code will be reported to the Honor Committee. See honorcode.gmu.edu for detailed information. You in this course are expected to behave at all times in a manner consistent with the GMU Honor Code. Violations of the Honor Code will not be tolerated in this course and will be reported according to GMU procedures. You must paraphrase any information from a source into your own words. Do not copy anything word for word, even if you are citing the source; direct quotes are not accepted for Critique and Redesign and Proposal projects in this class. The instructor reserves the right to use software to determine the extent to which the work is the student's.

Plagiarism: Plagiarism is the unacknowledged use of another person's labor, another person's ideas, another person's words, or another person's assistance. Unless otherwise stated in class, all work done for courses -- papers, examinations, homework exercises, laboratory reports, oral presentations -- is expected to be the individual effort of the student presenting the work. Any assistance must be reported to the instructor. If the work has entailed consulting other resources -- journals, books, or other media -- these resources must be cited in a manner appropriate to the course. Everything used from other sources -- suggestions for organization of ideas, ideas themselves, or actual language -- must be cited. Failure to cite borrowed material constitutes plagiarism. Undocumented use of materials from the World Wide Web is plagiarism. If you are caught plagiarizing or cheating, you will fail the assignment, and, depending upon the severity of the violation, you may fail the class.

Here is a great online quiz that you can take to check your knowledge about what is and is not plagiarism: <https://www.indiana.edu/~tedfrick/plagiarism>

Copyright Statement: George Mason University holds the copyright on all materials prepared by me for this course (lecture slides/videos, assignment questions, quiz and exam questions, chapter study questions). Reproducing or sharing these materials outside of our course (e.g. on study websites such as Course Hero, Quizlet, or Study Blue) is a copyright violation and will be reported to the Copyright Office. Students who violate the University Copyright Policy may place themselves individually at risk for liability in the event of a claim of copyright infringement.

Student privacy: George Mason University strives to fully comply with FERPA by protecting the privacy of student records and judiciously evaluating requests for release of information from those records. Please see George Mason University's student privacy policy <https://registrar.gmu.edu/students/privacy/>

Enrollment: Students are responsible for verifying their enrollment in this class. Schedule adjustments should be made by the deadlines published in the Schedule of Classes (available from the Registrar's Website: registrar.gmu.edu). After the last day to drop a class, withdrawing from this class requires the approval of the dean and is only allowed for nonacademic reasons. Undergraduate students may choose to exercise a selective withdrawal. See the Schedule of Classes for selective withdrawal procedures. Student services: The University provides range of services to help you succeed academically and you should make use of these if you think they could benefit you. I also invite you to speak to me (the earlier the better).

Students are responsible for the content of university communications sent to their George Mason University email account and are required to activate their account and check it regularly. All communication from the university, college, school, and program will be sent to students solely through their Mason email account.

The George Mason University Counseling and Psychological Services (CAPS) staff consists of professional counseling and clinical psychologists, social workers, and counselors who offer a wide range of services (e.g., individual and group counseling, workshops and outreach programs) to enhance students' personal experience and academic performance. Counseling Center: Student Union I, Room 364, 703-993-2380.

Disability Services at George Mason University is committed to providing equitable access to learning opportunities for all students by upholding the laws that ensure equal treatment of people with disabilities. If you are seeking accommodations for this class, please first visit <http://ds.gmu.edu/> for detailed information about the Disability Services registration process. Then please discuss your approved accommodations with me. Disability Services is located in Student Union Building I (SUB I), Suite 2500. Email: ods@gmu.edu | Phone: (703) 993-2474

The George Mason University Writing Center staff provides a variety of resources and services (e.g., tutoring, workshops, writing guides, handbooks) intended to support students as they work to construct and share knowledge through writing. University Writing Center: Robinson Hall Room A114, 703-993-1200. The writing center includes assistance for students for whom English is a second language.

University Libraries: University Libraries provides resources for distance students. (See <http://library.gmu.edu/distance> and http://infoguides.gmu.edu/distance_students

Diversity: George Mason University promotes a living and learning environment for outstanding growth and productivity among its students, faculty and staff. Through its curriculum, programs, policies, procedures, services and resources, Mason strives to maintain a quality environment for work, study and personal growth. George Mason University promotes a living and learning environment for outstanding growth and productivity among its students, faculty, and staff. An emphasis upon diversity and inclusion throughout the campus community is essential to achieve these goals. Diversity is broadly defined to include such characteristics as but not limited to, race, ethnicity, gender, religion, age, disability, and sexual orientation. Diversity also entails different viewpoints, philosophies, and perspectives. Attention to these aspects of diversity will help promote a culture of inclusion and belonging, and an environment where diverse opinions, backgrounds, and practices have the opportunity to be voiced, heard, and respected.

Notice of a mandatory reporting of sexual assault, interpersonal violence, and stalking: As a faculty member, I am designated as a "Responsible Employee", and must report all disclosures of sexual assault, interpersonal violence, and stalking to Mason's Title

IX Coordinator per University Policy 1412. If you wish to speak with someone confidentially, please contact one of Mason's confidential resources, such as Student Support and Advocacy Center (SSAC) at 703-380-1434 or Counseling & Psychology Services (CAPS) at 703-993-2380. You may also seek assistance from Mason's Title IX Coordinator by calling 703-993-8730 or emailing cde@gmu.edu.

Religious Holidays: A list of religious holidays is available on the University Life Calendar page. See the Religious Holiday Calendar. Any student whose religious observance conflicts with a scheduled course activity must contact the Instructor at least 2 weeks in advance of the conflict date in order to make alternative arrangements.