Brain and Behavior-PSY 201-90180 Syllabus

# Course Overview

# Required Text:

Instructor

Dr. Vollaro

**Phone**

631-451-4367

**Email**

vollarj@sunysuffolk.edu

**Class Time**

9:30-10:45 TR

**Class Location**

Southampton, 229

**Office Location**

Southampton, 213

**Office Hours**

Monday & Wednesday 7:30 am - 8:00 am

Tuesday 8:30 am - 9:30am 1:45 pm - 2:45 pm

Thursday 1:45 pm-2:45pm

Additional office hours by appointment.

Brain and Behavior, A Cognitive Neuroscience Perspective, David

Eagelman & Jonathan Downar

Brain and Behavior, Revisiting the Classic Studies, edited by Bryan Kolb, Ian Whishaw.

**Website:** <http://www.josephvollarophd.com/>

# Course Objectives-Upon completion of this course, students will be able to:

1. Explain the biological basis for behavior using the scientific process.
2. Explain the physiological background of motivation, theories of learning, thinking, behavior genetics, theories of personality and psychopathology.
3. Articulate recent psychological research and developments in brain and behavior.

**Course Policies:**

1. Class begins promptly at 9:30 am. Please be seated and quiet at this time.
2. **ALL CELL PHONES SHOULD BE TURNED OFF AND REMOVED FROM SIGHT!!!!- NO TEXTING DURING CLASS!**

* **IF THERE IS A NEED TO TEXT, PLEASE BE RESPECTFUL AND LEAVE THE CLASSROOM**
* **Three Strike Rule: If you are asked to remove your cell phone during class time three times you will be asked to hand in your phone before being admitted to class**

1. The course is designed to be an interactive course. Your experience and learning will be dramatically enhanced by utilizing the additional materials designed to assist you in further exploring the covered topics. These include:

* **Power-Point** slides corresponding to class lectures can be obtained off my website (josephvollarophd.com)
* There are additional course materials (i.e. homework videos) and links to sites that will be helpful during the course.
* **Psychology blog:** Throughout the semester, additional information and communication will be accomplished through the Psychology Blog on the website. You are encouraged to check it at a minimum weekly throughout the semester. If you join the blog, the information will be emailed to you directly each time the blog is updated. If the information is specific to this class, it will be noted in the blog content.

1. **EXAMS:**

* The general course policy is that students take all exams as scheduled. If an exam is missed, there will be **ONE** makeup exam given. The makeup exam will be given week before the final exam. It is the students’ responsibility to contact me to schedule the makeup. ***If the exam is not made up before the final a zero will be assigned for the grade.***
* Only ***ONE MAKEUP QUIZ*** is allowed. Quiz one & two must be made up before the mid-term exam. Quiz three and four must be made up by **December 10th.** **Any missed quizzes that are not made up will be assigned a grade of zero.**
* Once a student leaves the exam room, the exam is officially closed, and an exam cannot be initiated
* Students are required to bring a **#2** pencil to the exam
* If a scantron is not able to be graded by the machine **a 15-point penalty is assigned**

1. **ATTENDANCE:**

* The college defines excessive absence or lateness as more than the equivalent of missing more than one week of class during the semester. An instructor may remove a student, at any time, when, in the judgment of the professor, absences have been excessive.
* The policy for this course is to decrease **final average** two points for every absence over three for the semester
* **Lateness:** Students are expected to arrive to class on time. For the purposes of attendance, two lateness’s count as one absence.

1. **GRADING:** There will be two exams given during the semester; each one of these exams will count as 25% of your grade. There will be four quizzes and these will be averaged together and the average will count as 25% of your grade. The writing assignment will count as the final 25% of your grade.

* Note: Scantrons & Papers will be returned to students after exams are graded. It is students’ responsibility to keep them as a permanent record in the event that there is a discrepancy in the final grade. If a student does not retain a copy of the graded work, the missing grade will be counted as a zero.

1. **The following grading scale will be used:**

* A = 90-100
* B+ = 85-89
* B = 80-84
* C+ = 75-79
* C = 70-74
* D+ = 65-69
* F = Below 60

1. **PLAGIARISM/CHEATING:** The Suffolk Community College Code of Conduct expressively prohibits “all forms of academic or other dishonesty.” Two forms of dishonesty are cheating and plagiarism.

* **Cheating:** Any form of cheating, be it on a formal examination, informal quiz, or other submitted material, is a violation of the college code of conduct and may result in a failing grade for the course and/or serious disciplinary action/sanction (2002-2004 Catalog, Pg. 89.)
* **Plagiarism:** Students should realize that presenting the words and ideas of others as their own is dishonest. Examples of plagiarism include but are not limited to:
* Knowingly representing the words or ideas of another as your own
* Paraphrasing or copying materials from a source without appropriate citation
* Turning in another student’s work
* Buying and/or downloading a paper from a research service or term paper mill

**My course policy is that anyone who is caught plagiarizing or cheating will be given an F for the course. In addition, the name will be forwarded to the Dean of Students Office so there will be a record that the F was given because of plagiarism or cheating.**

1. **Homework:** The general homework assignments for the course are to keep up with the reading and to watch the assigned videos as we cover the material in class. Any further assignments will be specifically noted.

1. **Withdrawals/Inc:** If for any reason, you decide to withdraw from the class or want an Inc for the class, you must plan with me before the grades are handed in. Just stopping to attend class will result in an **F.**
2. **SCCC CARES:** At Suffolk, we are **C**REATING **A**WARENESS and **R**EADINESS to **E**ND **S**TIGMA about mental health issues. Please know that if you need support related to your psychological, emotional or social well being, there are counselors available on campus in the Counseling Center (Ammerman Building Room 209) to provide free and confidential counseling services. Contact Sarah Boles, Coordinator of Mental Health Services, at [boless@sunysuffolk.edu](mailto:boless@sunysuffolk.edu) or (631) 451-4530 for more information.

\*It is my hope to continue to develop a website that is interesting and useful for future students of my courses. Therefore, if you have any suggestions (i.e. sites that might be added) or encounter problems (i.e. links that are no longer active) please send me an email!

**IF YOU HAVE ANY QUESTIONS, PLEASE FEEL FREE TO CONTACT ME.**

**Course Schedule**

Note: All dates and topics are subject to change based on progress through the material.

|  |  |  |  |
| --- | --- | --- | --- |
| Week |  | | Reading & Website Videos |
| **September 3rd** | Introduction | | -Ch. 1  **Videos:**  -[How the human brain works](https://www.youtube.com/watch?v=9UukcdU258A)  -Imaging Techniques and the Brain\*  -Human Connectome Project\* |
| **September 10th** | finish Intro/Begin **Nerve Cell and Nerve Impulses** | | -Ch.3  **Videos:**  -What is it Like to be A Neuroscientist? \*  -[What Does a Neuropsychologist Do, Exactly?](https://www.youtube.com/watch?v=lqoFBvmRMSw)  -Neurons of Nerve Cells-Structure, Function and Types of Neurons\* |
| **September 17th** | Finish Nerve Cell and Nerve Impulses  - **QUIZ #1\*** | | **Videos:**  -[Nerve Impulses and Action Potentials](https://www.youtube.com/watch?v=nIojqRFJWbM)  -[Nerve impulse Animation](https://www.youtube.com/watch?v=dSkxlpNs3tU)  -EPSPs/IPSPs\*  -Summation of PSPs\*  -How Myelin Sheaths Speed up the Action Potential\* |
| **September 24th** | Synapses and Neurotransmitters | | **-**Ch. 3 (pgs. 83-87)  -Ch. 13: Neurochemical Influences of Emotion (pgs. 428-433)  -Ch. 14: (pgs. 447-469)  **Video:**  **-**Agonist and Antagonist\* |
| **October 1st** | Finish Synapses and Neurotransmitters  **-QUIZ #2\*** | | **Video:**  -Neurobiology of Addiction\*  -How does Narcan Work? \* |
| **October 8th**  **\****No classes 10/9\** | Functional Neuroanatomy (through Brain Stem) | | -Ch. 2  **Video:**  -The Spinal Cord  -Brain Death |
| **October 15th** | Finish Brain Stem  **MIDTERM\***  **FIRST SUBMISSION: 10/18/2018** | |  |
| **October 22nd** | **Functional Neuroanatomy** (Midbrain-Cortex) | | Ch.13, Core Limbic Structures (pgs 408-426)  **Revisiting the Classic Studies:** Chapter 9: Revisiting MacLean - The limbic system and emotional behavior  **Video:**  -Limbic System |
| **October 29th** | Finish Midbrain-Cortex  -**QUIZ 3\*** | | **Video:**  -Cerebral Cortex |
| **November 5th** | Neuroplasticity | | -Ch. 4  **Revisiting the Classic Studies:** Chapter 15: Revisiting Krech, Rosenzweig, & Bennett Effects of environmental complexity and training on brain chemistry  **Video:**  -Plasticity of the Brain |
| **November 12th** | Finish Plasticity  -**QUIZ 4\*** | |  |
| **November 19th**  *\*No classes 11/21-11/25,*  *Thanksgiving Recess\** | | Memory  **FINAL DUE DATE: 11/20/2018** | **-**Ch.9  **-Revisiting the Classic Studies:**  Chapter 8: Revisiting Scoville and Milner - Loss of recent memory after bilateral hippocampal lesions  **-** Chapter 12: Revisiting O'Keefe - Place units in the hippocampus of the freely moving rat - Matthew Shapiro |
| **November 26th** | Finish Memory, begin Sleep | | Ch. 10  **Videos:**  [How We Make Memories](https://www.youtube.com/watch?v=bSycdIx-C48&t=159s)  [Why We Need Sleep](https://www.youtube.com/watch?v=3mufsteNrTI) |
| **December 3rd** | Finish Sleep | |  |
| **December 10th** | **TBA** | |  |
| **December 17th**  **\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**  **December 21st**  \*Last day classes meet\* | **\*FINAL EXAM TBA** | |  |

**\*It’s helpful to write deadlines down in your phone or a calendar so you don’t forget! \***

**\*It would benefit you to download the 3D brain app on your phone\***

**WRITTEN HOMEWORK ASSIGNMENT (100 POINTS)**

The goal of the written paper is to offer the student an opportunity to explore topics in neuroscience to a much greater depth. The following process will assist them in doing so:

1. The student must identify a topic that will be covered by the paper. Part of this identification will be to narrow the topic appropriately so the paper is not too broad.

* **A paragraph summary of the final topic must be submitted to the professor and approved before the paper is completed! –Attach this approval to the final version**

1. Find at least (three) additional sources on the topic
   * + - At minimum, one article must be **peer-reviewed** (not an abstract, a full article)-Articles from Scientific American or Scientific American Mind will be counted as peer-reviewed
2. Complete a paper which includes an explanation of what interested you about the topic, a summary of what you initially knew about it. What additional information you obtained, and whether it was consistent with your prior views/opinions.

**Assignment Checklist:**

* + - Assignments can be handed in at any time before their due dates, but **NO ASSIGMENTS ARE ACCEPTED AFTER FINAL DUE DATE FOR ANY REASON**!

**FIRST SUBMISSION DUE DATE: 10/18/2018**

**FINAL DUE DATE: 11/20/2018**

* + - **FAILURE TO HAND IN AN ASSIGNMENT RESULTS IN A ZERO FOR THAT ASSIGNMENT**
    - Paper will be graded on content, grammar/organization/structure/how well you followed assignment requirements
    - **PLEASE MAKE SURE YOU SIGN IN EACH ASSIGNMENT TO INSURE YOU ARE CREDITED FOR SUBMITTING IT!**
    - Copies of peer-reviewed articles must be handed in with paper-***failure to do so will mean a penalty of 50 points***
    - Websites must be limited to **.edu, .gov, .org**
    - Text and Class notes can be used but don’t count towards the additional source, however**, they must be cited within the paper**
    - Paper must be completed in **APA Format- *failure to do so will result in a penalty of 50 points (PLEASE SEE THE WEBSITE RESEARCH PAPER AREA IF YOU ARE UNSURE OF APA FORMAT)***
    - It is strongly advised that before you submit the paper for a final grade you have it reviewed by someone