# THE UNIVERSITY OF HONG KONG FACULTY OF SOCIAL SCIENCES

Department of Psychology

## COURSE OUTLINE (2023/2024, SEMESTER TWO)

#### 1. Basic Information

Course Code	PSYC 7303	
Course Title	Biological Psychology	
Course Credits 6		
<b>Lecture Time &amp; Venue</b> Thursday 3:30am - 6:20pm, CPD-2.45		

# 2. Course Instructor / Tutors

Name	Office	E-mail	<b>Consultation Hour</b>
Dr. Fan Cao	6.14, JCT	fancao@hku.hk	By Appointment
(Instructor)			
Ms Kristy Chow	6.18, JCT	htkc@hku.hk	By Appointment
(Tutor)			

## 3. Course Description

This course provides an introduction to biological aspects of behaviour. Topics covered in this course include: anatomy and physiology of the nervous system, brain development, neuroplasticity, biological bases of behaviour and mental processes. Students will be encouraged to discuss scientific research relevant to these areas and to think critically about the shortcomings of the biological approach.

# 4. Course Learning Outcomes

On completing the course, students will be able to:

- a. understand well-established theories, findings, and methods in a number of specialized areas in biological psychology, including functional and structural neuroanatomy, the development of the nervous system, visual and auditory system and other senses, endocrine system, reproduction, learning and memory.
- b. demonstrate knowledge of the relationship between genetics, brain structures, functions and behaviour, and reason scientifically.
- c. discuss current scientific research relevant to the theories in these areas within the biological psychology field, and how it can be applied to real world problems with critical thinking.
- d. appreciate the logic of research design and methods and critically evaluate research findings.

## **5. Course Contents and Topics**

Topics covered in this course may include: neurons, synapses, nervous system, motor, vision, audition and other senses, sleep, emotion and memory.

## 6. Assessment Methods and Weighting

Assessment methods	Weighting in final course grade (%)
Midterm	40%
Final	20%
Group poster presentation	15%
Term paper	20%
Attendance/participation	5%
Total	100%

**Assessment Ratio**: 100% Coursework

**Group poster presentation.** In this coursework, students are required to form a group of 4 and choose one psychological topic and examine its neural mechanisms in a group poster presentation. The psychological topic could be anything related to psychological science such as language, memory, emotion, attention, creativity, sleep, decision making, and psychological disorders such as depression, autism etc. Students are encouraged to talk to their tutor when deciding on the topics. More information will be provided in the tutorials. This presentation will count towards 15% of the final grade. The group presentation should exhibit the highest standards of professional presentation (good grammar and spelling, professional tone, good organization and transitions between thoughts, etc.). It should also present thoughtful discussion of how neurological studies advance psychological sciences. In-depth research should be included in the presentation. Both teacher's evaluation and peers' evaluation will be taken into account for the group poster representation.

**Term Paper**. Each student is required to choose a research topic and propose a study on it. The paper should have a maximum of 1,000 words and should include introduction and methods sections. Students are encouraged to talk to their tutor when deciding on the topic. More information will be provided in the tutorials. The paper should exhibit the highest standards of professional presentation (good grammar and spelling, professional tone, good organization and transitions between thoughts, etc.) and should be submitted to Moodle by Thursday, May 2<sup>nd</sup>, 11:55 pm.

**Mid-term and Final**. Multiple-choices, true-or-false, filling in the blank, short essays, labelling will be used in the exams.

**Attendance and participation.** Lectures and tutorials are compulsory and you are required to participate in the discussions. Approved absence from classes requires formal documentation, such as a doctor's note, and will be considered on a case-by-case basis.

#### 7. Course Schedule

Week	Lecture Date	Lecture Topics	Tutorial*
1	Jan. 18th	Introduction, Overview of the CNS	
2	Jan. 25th	Gross anatomy	
3	Feb. 1st	Electrical signalling	
4	Feb. 8th	Development of the CNS	Tutorial 1
5	Feb. 15th	NO CLASS (Lunar New Year)	
6	Feb. 22nd	Language	
7	Feb. 29th	Memory	Tutorial 2
8	Mar. 7th	NO CLASS (Reading Week)	
9	Mar. 14th	Mid-term (4:30 – 6:20 pm; LE8)	
10	Mar. 21st	Learning and neural plasticity	
11	Mar. 28th	Developmental disorders	
12	Apr. 4th	NO CLASS (Ching Ming Festival)	
13	Apr. 11th	Psychological disorders	Tutorial 3
14	Apr. 18th	Group poster presentations	
15	Apr. 25th	Final (4:30 – 6:20 pm; LE8)	

<sup>\*</sup>Tutorials will be held on the listed dates, from 5:30 – 6:20 pm, in the same venue as the lecture room (CPD-2.45).

## 8. Recommended Readings & Online Materials

Textbook (optional):

- 1. Kalat, J. (2018). Biological Psychology. (13th Ed.). Cengage Learning. **978-1337408202**
- 2. Nolte, J. (2009). The Human Brain, An Introduction to Its Functional Anatomy. (6th Ed.). St. Louis: Mosby. **978-0323041317**

#### Other references:

Articles from scientific journals on biology/neuroscience/physiology that are related to specific topics will be assigned to students in addition to the textbook.

## 9. Late Assignment

Please finish and submit your assignments by the corresponding deadlines. Late assignments will be penalized by a 5% deduction for each day being late. For example, if you submit an assignment, which has a maximum mark of 10, within the first 24 hours after the original deadline, 0.5 mark (i.e., 5% of 10) will be deducted. For group work, all members of the group will be penalized.

#### **10. Important Notes**

**Feedback Policy**. Please note that we will not return any submitted paper or quiz paper. However, we will review the midterm quiz to help students revise. In addition, students can get feedback about the quizzes/reports/paper after the marks (within two to three weeks) are available by arrangement with the instructor or tutor. Students will be notified when the

marks/comments are available online. Students can receive individual feedback, including those on the final quiz, through scheduling a meeting with the course instructor or tutor.

**Marks Appeal.** Any dispute on marks you received on a written assignment or quiz must be made within a week after the marks are available. Another member of the teaching team will regrade the materials (without seeing the comments and marks given by the original grader). The average of the two marks will be final.

**Absence Policy.** Absence for more than three lectures will cause suspension of the enrolment in this course. No make-up will be given for any quiz missed. However, if a medical certificate is provided for the absence, make-up quizzes are in essay format within a week of the regular quiz time. Requests for make-up should be sent by email to the tutorial coordinator, Ms Kristy Chow (htkc@hku.hk) within 24 hours of the original day of the quiz. In normal circumstances, requests made afterwards will not be catered. There is absolutely no make-up quiz for the make-up quiz.

Academic Honesty. Academic dishonesty will not be tolerated. Any student who engages in any form of academic dishonesty (e.g., cheating on quizzes and/or exams, plagiarism, interfering with grading, etc.) will receive a grade of F in this course and will be reported to the Department / Faculty Office / University Disciplinary Committee for further disciplinary action. There will be no exceptions. The Department of Psychology has formulated departmental policies and guidelines on student misconduct. You can visit the following webpage for more information: https://psychology.hku.hk/useful-information-to-current-students/ for more information. The University has published a booklet entitled "What Is Plagiarism? (https://tl.hku.hk/plagiarism/). You are strongly advised to read this booklet, and consult your instructor or tutor if you have any questions.

Plagiarism. A softcopy is required for all written assignments. The softcopy will be checked for plagiarism against a database of articles, books, webpages, and essays submitted by students at HKU and other universities. No credit will be given for an assignment that contains plagiarized materials. Further penalties may also be applied. These penalties may include a zero mark for the course. Plagiarism will also be reported to the Department / Faculty Office / University Disciplinary Committee for consideration of possible disciplinary action. If you are not sure what constitutes the academic offense of plagiarism, checkout the webpage at http://www.hku.hk/plagiarism. Please note that if you reuse any material previously submitted for another course without proper acknowledgement, that also constitutes plagiarism, even though you are the author of the original work. This is called self-plagiarism. Also, for group projects, all group members are responsible for the group submission and will receive the same penalty if plagiarized materials are discovered.