2021 학년도 2학기 강의계획안

교과목명 Course Title	ANIMAL BEHAVIOR	학수번호-분반 Course No.	30255
개설전공 Department/Major	LIFE SCIENCES	학점/시간 Credit/Hours	3/3
수업시간/강의실 Class Time/ Classroom	ONLINE-BASED COURSE (NO IN-CLASS LECTURES)		
담당교원 Instructor	성명: 장이권 Name: YIKWEON JANG	소속: LIFE SCIENCES Department	
	E-mail: jangy@ewha.ac.kr	연락처: 02-3277-4496 Telephone	
면담시간/장소 Office Hours/ Office Location	Mondays 11:00 - 12:00 / General Science Building B318		

Ⅰ. 교과목 정보 Course Overview

1. 교과목 개요 Course Description

This course is an introduction to the study of animal behavior. The unifying theme of this course is evolutionary, examining how behavior contributes to the survival and reproduction of organisms through evolution by means of natural and sexual selection. This course will focus on ultimate explanations of animal behavior with some attention to proximate mechanisms. The ultimate explanations typically concern “why animals behave the way they do,” whereas the proximate mechanisms examine “how animals behave the way they do.” The key topics covered in this course include natural selection and evolution, genes and the environment, animal learning, foraging behavior, predatory-prey interactions, evolution of sex, sexual selection, mating systems, animal communication, habitat selection and migration, social behaviors, and finally human behaviors. Students in this course are exposed to the process of scientific study through the field of animal behavior and to reading the primary literature of animal behavior.

My teaching approach consists of introduction to a topic with relevant examples, basic theories, and recent developments within this topic. I like to approach a topic that I am going to teach by first introducing examples relevant to the topic. I try to draw examples that are familiar, interesting, sometimes crazy, using multi-media. Then I present basic theories behind both the examples and the topic that I am going to teach. I also cover classical papers on the topic. Finally, I provide recent developments in the primary literature on the topic and try to connect other conceptual issues.

This course is designed for upper-level undergraduate students who want to better understand the mechanisms and evolution of animal behavior. Students who are taking this course should have completed the introductory biology courses. Through the readings,

videos, discussions, assignments, students in this course will have opportunities to develop content knowledge about animal behavior.

2. 선수학습사항 Prerequisites

NONE

3. 강의방식 Course Format

강의 Lecture	발표/토론 Discussion/Presentation	실험/실습 Experiment/Practicum	현장실습 Field Study	기타 Other
100 %	%	%		%

(위 항목은 실제 강의방식에 맞추어 변경 가능합니다.)

강의 진행 방식 설명 (explanation of course format):

4. 교과목표 Course Objectives

These objectives of this course are for you to:

- understand evolution by natural selection and how selection has shaped the behavior of animals
- understand the scientific methods for research in animal behavior, including formulating hypotheses, experiments, and interpretation of data.

Upon completing this course, students should be able to

- comprehend the key theories of evolution by natural selection
- demonstrate current knowledge of major concepts in animal behavior
- develop the ability of applying the scientific method to investigating animal behavior
- critically evaluate research studies in animal behavior.

5. 학습평가방식 Evaluation System

중간고사 Midterm Exam	기말고사 Final Exam	퀴즈 Quizzes	발표 Presentation	프로젝트 Projects	과제물 Assignments	참여도 Participation	기타 Other
40 %	40 %	10 %	%	%	%	10 %	%

(위 항목은 실제 학습평가방식에 맞추어 변경 가능합니다.)

*그룹 프로젝트 수행 시 팀원평가(PEER EVALUATION)이 평가항목에 포함됨. Evaluation of group projects may include peer evaluations.

평가방식 설명 (explanation of evaluation system):

There are two exams in this class: mid-term exam and final exam. At this moment I plan to hold two exams in classroom. Depending on the status of COVID-19, two exams may be held online. I am going to announce the way the exam is held about two weeks before the scheduled exam week. If the exams are held in classroom, students MUST come to the classroom for these exams. All other classes are only

online based, and students do not come to the classroom.

Ⅱ. 교재 및 참고문헌 Course Materials and Additional Readings

1. 주교재 Required Materials

장이권 외 6인 역. 2021. 동물행동학. 11판. 월드사이언스.

Alcock, John. Animal Behavior. 9th ed. Sinauer. Sunderland, Massachusetts. USA.

Dugatkin, Lee Alan. Principles of Animal Behavior. 2nd ed. W. W. Norton & Company. USA.

2. 부교재 Supplementary Materials

Although these books are used as textbooks for this course, you don't have to purchase these books. A booklet that contains all the presentation files in this course will be available for purchase. Exams are based on the booklet.

3. 참고문헌 Optional Additional Readings

Ⅲ. 수업운영규정 Course Policies

* 실험, 실습실 진행 교과목 수강생은 본교에서 진행되는 법정 '실험실안전교육(온라인과정)'을 필수로 이수하여야 함.
* For laboratory courses, all students are required to complete lab safety training.

Students should behave with integrity. Students who plagiarize will receive an F in the subject. We will report any incident of academic dishonesty to campus judicial authorities, which could result in a failing grade for the class or expulsion from the University.

Ⅳ. 주차별 강의계획 Course Schedule (최소 15주차 강의)

주차	날짜	주요강의내용 및 자료, 과제(Topics & Class Materials, Assignments)
1주차	월 일 (요일)	01 Introduction to the Class
	월 일 (요일)	02 What is behavior?
2주차	월 일 (요일)	03 Scientific Approach
	월 일 (요일)	04 Evolution by natural selection
3주차	월 일 (요일)	05 Adaptationist hypotheses
	월 일 (요일)	06 Development of Behavior

주차	날짜	주요강의내용 및 자료, 과제(Topics & Class Materials, Assignments)
4주차	월 일 (요일)	07 Learning
	월 일 (요일)	08 Cultural transmission
5주차	월 일 (요일)	09 Foraging
	월 일 (요일)	10 Anti-predator behavior
6주차	월 일 (요일)	11 Animal Communication
	월 일 (요일)	12 Evolution of communication
7주차	월 일 (요일)	13 Habitat selection
	월 일 (요일)	14 Orientation
8주차	월 일 (요일)	Mid-term exam
	월 일 (요일)	
9주차	월 일 (요일)	15 Game theory
	월 일 (요일)	16 Evolution of sex
10주차	월 일 (요일)	17 Sexual Selection
	월 일 (요일)	18 Intrasexual Selection
11주차	월 일 (요일)	19 Intersexual selection
	월 일 (요일)	20 Mating systems
12주차	월 일 (요일)	21 Human mating strategies
	월 일 (요일)	22 Kin selection
13주차	월 일 (요일)	23 Eusociality
	월 일 (요일)	24 Reciprocal Altruism
14주차	월 일 (요일)	25 Play
	월 일 (요일)	26 Animal Personality
15주차	월 일 (요일)	Final exam
	월 일 (요일)	
보강1 (필요시) Makeup Classes	월 일 (요일, 장소)	
보강2 (필요시) Makeup Classes	월 일 (요일, 장소)	

V. 참고사항 Special Accommodations

* 학칙 제57조에 의거하여 장애학생은 학기 첫 주에 교과목 담당교수와의 면담을 통해 출석, 강의, 과제 및 시험에 관한 교수학습지원 사항을 요청할 수 있으며 요청된 사항에 대해 담당교수 또는 장애학생지원센터를 통해 지원받을 수 있습니다.

According to the University regulation #57, students with disabilities can request special accommodation related to attendance, lectures, assignments, and/or tests by contacting the course professor at the beginning of semester. Based on the nature of the students' requests, students can receive support for such accommodations from the course professor and/or from the Support Center for Students with Disabilities (SCSD).

*** 강의계획안의 내용은 추후 변경될 수 있습니다.**

* The contents of this syllabus are not final—they may be updated.