

Course Syllabus

Course Code	SCBE102 (1 credit, 0-3-1)
Course Title	General Biology Laboratory I
Semester	Semester 1 – 2022
Date/Time	Tuesday 13:30– 16:30
Room	SC3-404 for EGBI, SCBE, SCIN SC3-408 for SCBM, SCME
Course coordinator	Associate Professor Dr.Theeraporn Puntheeranurak
Email	theeraporn.pun@mahidol.edu
Instructor	Biology department staffs
Science Technician	Ms. Sumalee Onsumang

Course Description

This course illustrates the processes, concepts, and principles discussed in Principles of Biology through investigative activities that emphasize examples from everyday life, keeping a lab notebook, the scientific method, and becoming familiar with the use of biology equipment. Lab exercises include microscope, plant and animal tissue, photosynthesis, cell division, genetics, evolution and ecology.

Course Objectives

1. To recognize independent and dependent variables in an experiment,
2. To understand essential processes of life,
3. To distinguish organisms of different kingdoms,
4. To outline the basics of photosynthesis and respiration,
5. To point out local ecological habitats,
6. To distinguish mitosis from meiosis,
7. To understand inheritance patterns in humans,
8. To understand population genetic and evolutionary biology.

Material

Google classroom class code: 6t6453q

Class link: <https://classroom.google.com/c/NTM3MjM5MTM2OTA1?cjc=6t6453q>

Course Outline

Date	Topic	SC3-404 (room 5) (SCBM, SCME)	SC3-408 (room 6) (EGBI, SCBE, SCIN)
		Instructors	Instructors
16 August	Orientation & Lab Safety	Theeraporn, Ekgachai, Supeecha	
23 August	Topic 1: Microscope	Ekgachai*, Theeraporn	Puey*, Pagkapol
30 August	Topic 2: Cell Structure and function	Pagkapol*, Puey	Metha*, Alisa*
		Theeraporn	
6 September	Topic 3: Movement of molecules	Theeraporn*, Siravit	Supeecha*, Alisa*
13 September	Topic 4: Animal tissues	Warut*, Surang	Siravit*, Theeraporn
20 September	Topic 5: Plant tissues	Thitinun*, Theeraporn	Patompong*, Metha*
To be announced	Midterm Examination	Theeraporn	
18 October	Topic 6: Cell division	Wachareeporn*, Surang*	Arunee*, Puey*
		Theeraporn	
25 October	Topic 7: Population genetics	Chalita*, Theeraporn	Warut*, Parinda
8 November	Topic 8: Ecology	Chalita*, Napat	Jenjit*, Theeraporn
15 November	Topic 9: Animal behavior	Jenjit, Theeraporn	Nuttaphon*, Parinda
To be announced	Final Examination	Theeraporn	

* main instructor for each topic

Evaluation

1. Lab attendants 10% (1% for each week)
2. Quiz 18% (2% for each topic)
3. Lab reports 18% (2% for each topic)
4. Midterm Examination 30% (6% for each topic)
5. Final Examination 24% (6% for each topic)

Students will be evaluated from their total score (out of 100%). Evaluation and achievement will be justified according to Faculty and University code of conduct grading system of A, B+, B, C+, C, D+, D and F. To pass this course, students must earn a grade of at least D.

Tentative grading system

Total percentage of evaluation	0-49	50-54	55-59	60-64	65-69	70-74	75-79	80-100
Grade	F	D	D+	C	C+	B	B+	A