

Course Name:	SCSL 198 Global Environment and Sustainability 3 (3-0-6)
Lectures:	Monday 13:30 – 16:30 PM
Location:	Salaya
Course-coordinator:	Dr.Toemthip Poolpak

Course Syllabus

Course Description

An overview of the global environmental issues, the relationship between human society development and the use of natural resources from the past to present, global environmental change and development of more sustainable approaches; focusing on Earth and environmental processes, the population growth and social development and its pressures on natural resources and ecosystem; energy usage from past to present and the future; causes and socio-economic implications of climate change, food security, biodiversity and natural hazard; Anthropogenic sources of environmental deterioration and pollution and their impact on biodiversity and sustainability; sustainable solutions to use of Earth's resources.

Course Learning Outcomes (CLOs)

After completing this course students should be able to:

- 1) Elucidate the scientific basis of the global environmental issues covered in class, including the technical options available for avoiding or contending with each problem.
- 2) Discuss social, psychological, economic and political issues surrounding each of the global environmental issues covered in class.

Teaching and Evaluation Methods

Teaching will be in the classroom with interacting perspectives. A textbook is not required and course content will follow the recommended reading materials.

Midterm and final examinations are in a written format and will be announce at the beginning of the class or with this course outline.

Evaluation

1. Mid-term	40%
2. Final examination	40%
3. Class participation	10%
4. Class presentation	10%

Students will be evaluated from their total score (out of 100%). Grading system is A, B⁺, B, C⁺, C, D+, D and F.

* If situations are permitted.

Course Coordinator: Dr. Toemthip Poolpak (TP)

Instructor: Associate Professor Dr. Prayad Pokethitiyook (PP)
 Dr. Nuttaphon Onparn (NO)
 Dr. Toemthip Poolpak (TP)

Teaching Plan

Month	Date	Lecture-Topic	Instructor
Jan	5	Population growth and its impact	NO
	12	Global climate change, Greenhouse effects	NO
	19	Biodiversity loss	NO
	26	Invasive species	NO
Feb	2	Soil resources: human activity and soil	TP
	9	Water resources and alternative sources of freshwater	TP
	16	Pollution and waste disposal	TP
Feb	23	Topic Review	TP
Mar	2-6	Mid-Term Examination	NO/TP
	9	Hazardous earth process	TP
	16	Global pandemic	PP
	23	Ocean acidification, coral bleaching	PP
Apr	30	Air Pollution: cause and effects	PP
	20	Energy for the Future	PP
	27	Global environment: Presentation	PP
	28	Final Examination (if any)	PP/TP

References:

David McConnell and David Steer, 2015. The Good Earth: Introduction into Earth Science, 3rd Edition. McGraw-Hill.

G. Tyler Miller Jr. and Scott Spoolman, 2009. Living in the Environment: Principles, Connections, and Solutions, 16th Edition. Brooks/Cole

William P. Cunningham and Barbara S. Cunningham, 2010. Principles of Environmental Science. 5th Edition. WCB/McGraw-Hill