

NE466- Environmental science and technology

Hour: Lecture: 2 Hrs.

Tutorial: 2 Hrs.

Credit: 3.

Coordinator: Eltantawy Fared

Text Book:

- Cheryl Simon & Ruth S. Dyries, *One earth, one future – Our changing Global Environment*, (translation in Arabic Sayed Ramadan), International Pub & Dis. House., 1992.

Specific course information:

- a. An Introduction to Basic Principles, Environmental Science and Technology, The Development of Human Awareness Regarding Environment Problems, Population and the Environment, Development and the Environment, Population and the Environment, Poverty and the Environment, Environment and Consumer Life styles, Relation between Human Health and Environmental Degradation, Environmental Improvement, Economic and Social Benefits of Pollution Abatement.
- b. Prerequisite: none
- c. Designation: Required

Specific goals for the course:

- An understanding of professional and ethical responsibility.
- An ability to communicate effectively.
- The broad education necessary to understand the impact of engineering solutions in a global and societal context.
- Recognition of the need for, and an ability to engage in life-long learning.

Course instruction outcomes:

- The students will be able to understand the earth's resources – Helping the students to understanding man kinds position within the environment
- The students will be able to explain that most forms of environmental degradation are a result of consumerist lifestyle
- The students will be able to change negative attitudes regarding the environment.

Student outcomes:

F, G, H, I

Topics Covered:

The biosphere – the natural built environment – ecosystem components and their properties – Environmental resources – properties of ecosystems and equilibrium – The evolution of mankind's relation with the environment throughout different eras – The development of human awareness regarding environment problems – Population growth – Development &

Sustainable development – Poverty and the environment – Environment and consumer Life styles – Relation between human health and environmental degradation – Environmental improvement – Economic and social returns/benefits of pollution abatement – Risk analysis – Environmental management.

Course / credit hours	Math & Basic Sciences	Engineering Topics	General Education	Others
Environmental science (NE 466)/3			2	1