R07

Set No. 2

## III B.Tech I Semester Examinations, May 2011 ENVIRONMENTAL STUDIES Instrumentation And Control Engineering

Time: 3 hours Max Marks: 80

Answer any FIVE Questions All Questions carry equal marks

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1. What are various types of solids generated from your city? Describe the outcome of poor management of solid waste illustrating your answer with any case study.

[16]

- 2. (a) Explain the control measures for controlling soil pollution.
  - (b) What is noise? Describe briefly effects of noise on human health. [8+8]
- 3. (a) Summarize the scope and importance of the environmental studies.
  - (b) Define the following terms.
    - i. Environmental studies.
    - ii. Environmental science.
    - iii. Environmental engineering

[8+8]

- 4. (a) Differentiate between biodiversity and ecosystem diversity.
  - (b) What are ecological pyramids? Show ecological pyramid for a pond, a forest and a desert. [8+8]
- 5. (a) Explain how consumerism has affected the present society?.
  - (b) What are the recent climate changes noticed in the environment. [8+8]
- 6. (a) Name hot spots of biodiversity in India. Why should we protect the wild life.
  - (b) List five endangered and endemic species of India. Explain the various methods to preserve these species on Indian earth. [8+8]
- 7. Explain the following information technology tools used to study global environment.
  - (a) GIS.
  - (b) GPS
  - (c) Remote sensing.

[16]

- 8. (a) List out the steps you have personally taken to save energy in college and at home
  - (b) Discuss the disparity in energy consumption between developing countries and developed countries. [8+8]

R07

Set No. 4

Max Marks: 80

## III B.Tech I Semester Examinations, May 2011 ENVIRONMENTAL STUDIES Instrumentation And Control Engineering

Instrumentation And Control Engineering

Time: 3 hours

Answer any FIVE Questions

All Questions carry equal marks

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- 1. (a) Discuss the various methods of waste land reclamation.
  - (b) What is meant by consumerism? State root causes for attaining excess consumerism. [8+8]
- 2. (a) Give a detailed account of the process of succession in a pond ecosystem.
  - (b) Explain in what way estuarine ecosystem differs from a lake ecosystem. [8+8]
- 3. Define HIV/AIDS. What are the causes, symptoms and preventive methods of AIDS?.
- 4. (a) Explain the significance of each a biotic factor of the environment in regulation of environmental conditions.
  - (b) What is environmental science? Discuss its inter connections and limitations. [8+8]
- 5. (a) Explain the how you conduct a survey on wetlands bird life ( Rivers, lakes, marshes etc. )
  - (b) Prepare a document on how human influence on aquatic ecosystems and their consequences on human life. [8+8]
- 6. (a) Define drought. How is it interpreted based on meteorological, agricultural and hydrological effects.
  - (b) List the major arguments cited against the construction of large dams. [8+8]
- 7. (a) Differentiate
  - i. Consumption value and productive value of biodiversity.
  - ii. Bio sphere reserve and gene bank.
  - (b) Enumerate five important biosphere reserves, national parks and wild life. State where they are located. [8+8]
- 8. Write case studies on environmental pollution.

[16]

R07

Set No. 1

## III B.Tech I Semester Examinations, May 2011 ENVIRONMENTAL STUDIES Instrumentation And Control Engineering

Time: 3 hours Max Marks: 80

Answer any FIVE Questions All Questions carry equal marks

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- 1. (a) Explain the role of teachers and students in public awareness of environmental protection.
  - (b) Why do consider the environmental studies are interdisciplinary in nature.

[8+8]

- 2. (a) What are human rights? Explain how human rights influence social environment .
  - (b) Explain the following environmental related diseases?
    - i. Water borne diseases
    - ii. Air pollution related diseases.

[8+8]

- 3. (a) Classify solid waste . What are the sources of urban and industrial solid wastes.
  - (b) What adverse effects can solid waste cause? How can the solid waste be managed? [8+8]
- 4. (a) Explain different extinction species, endangered species, vulnerable species and rare species with examples.
  - (b) Classify biodiversity and explain each type.

[8+8]

- 5. (a) Discuss the major features of a river ecosystem that differ from that of a lake ecosystem.
  - (b) Discuss the salient features of an estuarine ecosystem.

[8+8]

- 6. Describe the following aspects of polluted site municipal solid waste which you have visited.
  - (a) Physical features.
  - (b) Type of solid waste & Their composition
  - (c) Nature and quantity of waste of collection.
  - (d) Type of treatment and disposal.
  - (e) Environment pollution problems such air pollution, ground water pollution etc. [16]
- 7. (a) Explain the possible contributions of individual towards energy conservation.

R07

Set No. 1

(b) Compare and contrast nuclear power with solar power from the environmental point of view. [8+8]

- 8. (a) What are the ozone depleting chemicals and their impacts on global temperature?.
  - (b) What are the ethics and issues involved in conservation of nature?. [8+8]

R07

Set No. 3

## III B.Tech I Semester Examinations, May 2011 ENVIRONMENTAL STUDIES Instrumentation And Control Engineering

Time: 3 hours Max Marks: 80

Answer any FIVE Questions All Questions carry equal marks

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- 1. (a) Explain the factors affecting biodiversity and its conservation.
  - (b) Discuss the need for biodiversity conservation.

[8+8]

- 2. (a) Discuss consumerism and waste products in relation to developed and developing
  - (b) Explain in detail the nuclear accidents and their effects on environment. [8+8]
- 3. (a) What is meant by value education? Explain the necessity of value education.
  - (b) What do HIV and AIDS mean? Explain objectives of value education. [8+8]
- 4. (a) What is the methodology to be followed for study of causes, and impacts of a
  - (b) Write about any polluted site you have visited and describe your findings in details. [8+8]
- 5. (a) Explain how public awareness can help to reduce pollution?
  - (b) Explain the limitations and inter connection of environmental science. [8+8]
- 6. (a) Explain the recycle and reuse of municipal solid waste
  - (b) List the various sources of air pollution and mention type of pollutants generated from each source. [8+8]
- 7. (a) What is difference between ecology and environment. List out the factors affecting Terrestrial ecosystem.
  - (b) What are the limiting factors of an ecosystem in an ecosystem.
  - (c) Why matter cycling in tropical system is more efficient.

[6+6+4]

- 8. (a) Explain the difference in consumption of resources by the countries of the developing and developed world.
  - (b) Discuss the ill effects of deforestation and explain what you understand by the term sustainable management of forests. [8+8]