

Open University of Sri Lanka Masters Degree in Environmental Science - level 6 Academic year - 2006/ 2007

Course title- Understanding the Environment Course code - NEP 1205

Duration - 3 hours

Date - 9<sup>th</sup> November, 2007

Time - 9.30 am -12.30 pm

## Answer any *four* (4) questions

- a) Explain the energy flow through the primary , secondary and tertiary trophic levels of an ecosystem using a simplified energy flow diagram,
  b) Describe the important features of energy flow in an ecosystem.
- 2) a) Describe the composition of air in the atmosphere.b) Explain the formation of acid rain and its threat to life.
- 3) Describe the beneficial effects of adding organic matter to the soil.
- 4) Describe the natural environment of a tropical rain forest.
- 5) Write a short essay on coastal ecosystems in the southwestern region of Sri Lanka.
- 6) Explain how Nitrogen as a nutrient is maintained in the soil by natural processes in ecosystems.
- 7) " A community living along a polluted shallow canal frequently suffers from diarrhea and mosquito borne diseases. Most men and women in the community are unemployed and their income is not sufficient to meet the daily requirements. There are frequent conflicts among members of the community, young tend to take drugs and elders suffer from depression"

Propose a mechanism to solve the environment, health, economic and social problems of the community indicated above.