Department of Information Technology
GE6351 Environmental Science and Engineering

UNIT – 1

2-Marks

1. **Define environment.**

   Environment is defined as the sum of total of all the living and non-living things around us influencing one another.

2. **What is Environmental Hazards?**

   An environmental hazard is a substance, state or event which has the potential to threaten the surrounding natural environment and / or adversely affect people's health.

3. **List Some Physical Hazards?**

   1. Cosmic rays
   2. Drought
   3. Earthquake
   4. Electromagnetic fields
   5. E-waste
   6. Floods
   7. Fog

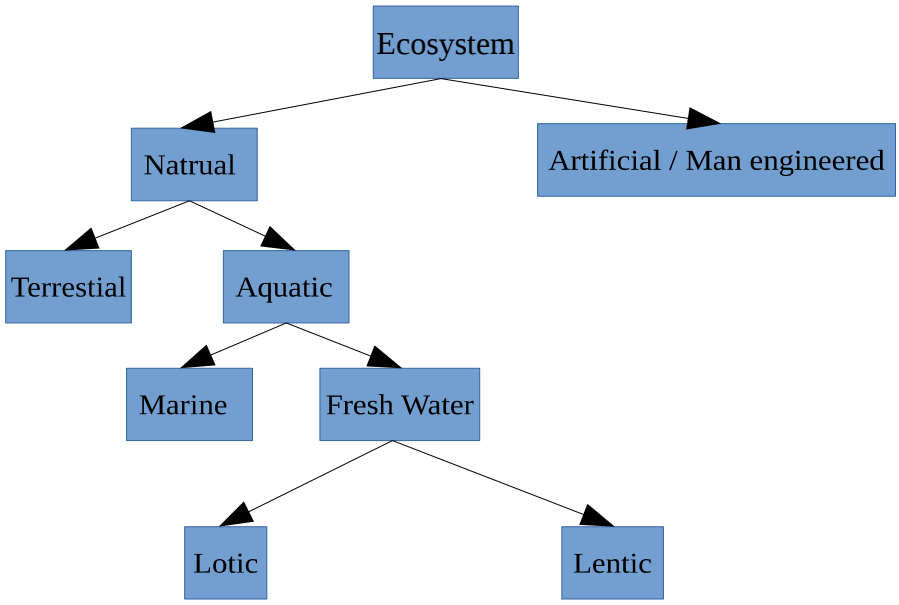
4. **What is Eco-System?**

   A group of organisms interacting among themselves and with environment is known as ecosystem. The Eco – System is a community of different species interacting with one another and with their non-living environment exchanging energy and matter.

5. **List Some Chemical Components of Eco-System?**

   1. Organic Components
      1. Protein
      2. Lipids
      3. Carbohydrates
   2. Inorganic Components
      1. Micro Elements (Al,Co,Zn,Cu)
      2. Macro Elements (C,H,O,P,N,K)

6. Draw the classification of ecosystem.



7. What is Ecological succession?

The Progressive replacement of one community by another community till the development of stable community in a particular area is called ecological succession.

8. What are stages involved in the ecological succession?

1. Nutation
2. Invasion
    1. Migration
    2. Establishment
3. Competition
4. Reaction
5. Stabilizations

9. What are all the types of forest Eco-System?

1. Tropical rain forests
2. Tropical deciduous forests
3. Tropical scrub forests
4. Temperate rain forests
5. Temperate deciduous forests

10. What are all the characteristics of Forest Eco-System?

1. Warm Temperature.
2. Adequate Rainfall.
3. Maintains climate and rainfall.
4. Support for many wild animals and protects biodiversity.
5. Soil is rich with organic matters and nutrients.
6. Penetration of light is poor so conversion of organic
7. matter into nutrients is very fast.

11. What are all the characteristics of Grassland Eco-System?

1. Plain Land occupied by grasses
2. Soil is rich with nutrients and organic matter
3. Idle place for grazing animals
4. Has low or uneven rainfall

12. What are all the Types of Aquatic Eco-System?

1. Fresh Water Ecosystem
    1. Ponds,Lakes,streams,lakes,rivers
2. Salt Water Ecosystem
    1. Oceans,Estuaries

13. What are all the types of Lakes present in the environment?

1. Oligotrophic Lakes (Has Low nutrient concentration).
2. Eu-trophic Lakes (Over nourished by nutrients).
3. Dy-strophic Lakes (Low pH and high acid content with brown water).
4. Volcanic Lakes (Water received from volcanic eruptions).
5. Meromictic Lakes (Rich is salts)
6. Artificial Lakes (Created due to constriction of dams).

14. What is Biodiversity?

Biodiversity is defined as, “the variety and variability among all groups of living organisms and the ecosystem in which they occur.”

15. What are all the importance of Biodiversity?

1. We depending for food and medicine and industrial products.
2. It protects the fresh air, clean water and productive land.
3. Important for forestry and fishers and agriculture.
4. Loss of Biodiversity has serious economic and social costs for any country.

16. What is species diversity?

Species diversity is the diversity between different species. The sum of varieties of all living things at the species level is known as species diversity.

1. Different kinds of plants.
2. Different kinds of Animals.

17. What are all the values of biodiversity?

1. Consumptive value
2. Productive use value
3. Social Value
4. Ethical Values
5. Aesthetic value

18. What are the criteria to recognize a hot spot?

1. Richness in endemic species.
2. Significant percentage of specialized species.
3. The site is under threat.
4. Contains important gene pool of plants of
5. potentially useful plants.

19. What is Endangered Species and list the factors?

A Species is said to be endangered, when its number has been reduced to a critical level. Unless it is protected and conserved, it is in immediate danger of extinction.

1. Pollution
2. Over exploitation
3. Climate Change

20. List the Methods of In-situ Conservation.

1. Biosphere Reserves.
2. National Parks
3. Wild life Sanctuaries
4. Gene Sanctuary.