Conservation of Plants and Animals

- **Deforestation**: Deforestation is the process of clearing of forests in order to use the land for industrial, agricultural, and other purposes.
- Causes of deforestation
- Natural causes
- Forest fire
- Severe droughts
- Man-made causes
- Using land for agricultural purposes
- Rapid urbanization
- Procurement of wood for fuel and furniture
- Consequences of deforestation
- Increase in the level of carbon dioxide in atmosphere, which leads to global warming
- Lowering of ground water levels
- Increase in pollution level and temperature
- Decrease in fertility of soil and amount of rainfall
- Increase in frequency of droughts and floods
- **Desertification-** conversion of fertile lands into deserts.

Biodiversity is the species richness of the biosphere. It is defined as the number and variety of life forms such as plants, animals and microorganisms in an area.

- It supports all the essential living resources such as wild life, fisheries and forests.
- Forests help in maintaining the delicate balance of nature.
- Animals living in forests are called wild animals.
- The plants found in a particular area are known as **flora** of that area.
- The animals found in a particular area constitute **fauna** of that area.

- Those species of plants and animals, which are found only in a particular area, are called **endemic species**. (**Species** is a group of organisms in population which are capable of interbreeding)
- The animals, whose numbers are diminishing to a level that they might face extinction, are called **endangered animals**. For example: tiger, lion, and elephants
- **Project tiger** was launched by the government of India to protect endangered tigers in their natural habitat.
- The flora and fauna of a particular habitat can be protected through special **protected areas**.

Protected areas

• Wildlife sanctuary:

It is the place where wild animals are protected from hunting and are provided with suitable living conditions. For example: Madhumalai wildlife sanctuary in Tamil Nadu, Chilika bird sanctuary in Orissa, etc.

• National parks:

These are the areas reserved for wildlife. They are maintained and preserved by the government for the public to visit. For example: Ranthambore National Park in Rajasthan, Kanha National Park in Madhya Pradesh, etc. Satpura National Park is the first reserve forest of India.

• Biosphere Reserves:

It is a large protected land for conservation of wild life, plant and animals resources, and the traditional life of the tribal groups living in the area. For example: Pachmarhi Biosphere Reserve and Nilgiri Biosphere Reserve in India.

Red Data Book:

It is the source book maintained by IUCN (International Union for Conservation of Nature and Natural resources). It keeps a track record of various endangered species of plants and animals.

Migration

- It is the movement of birds and animals from their original habitat to other places at a particular time.
- Migratory birds fly to distant areas every year during a particular time because of
- climatic changes- their original habitat becomes very cold and inhospitable
- lack of food availability

• Numerous migratory birds including ducks, geese, flamingos, and cranes fly to India every year.

• Recycling of paper

- One ton of paper is made from about seventeen fully-grown trees.
- Papers should be recycled and reused to conserve forest.
- Each paper can be recycled three to seven times.
- Recycling of paper saves trees, energy and water.
- It prevents the release of harmful chemicals emitted during paper manufacturing in nature.

Reforestation

- Restoring of destroyed forests by planting new trees is called **reforestation**.
- It helps in checking environmental degradation.