

## Conservation of plants and Animals

1. Fill in the blanks:

(a) A place where animals are protected in their natural habitat is called \_\_\_\_\_

(b) Species found only in a particular area is known as \_\_\_\_\_ .

(c) Migratory birds fly to far away places because of \_\_\_\_\_ changes.

Answer:

(a) A place where animals are protected in their natural habitat is called wildlife sanctuaries .

(b) Species found only in a particular area is known as endemic species .

(c) Migratory birds fly to far away places because of climatic changes.

2. Differentiate between the following:

(a) Wildlife sanctuary and biosphere reserve

(b) Zoo and wildlife sanctuary

(c) Endangered and extinct species

(d) Flora and fauna

Answer:

(a)

Wildlife sanctuary	Biosphere reserve
It is an area within which animals are protected from possible dangers such as hunting. Their habitat is also conserved in this area.	It is a large protected area constructed for the conservation of biodiversity.
It provides protection and suitable living conditions to wild animals.	It helps in the conservation of various life forms such as plants, animals, and micro-organisms.
Pachmarhi sanctuary is a wildlife sanctuary.	Pachmarhi biosphere reserve is a popular biosphere reserve.

(b)

<b>Zoo</b>	<b>wildlife sanctuary</b>
Zoo is man made places where animals kept in artificial setting instead of their natural habitat and provided protection .	It is an area within which animals are protected from possible dangers such as hunting. Their habitat is also conserved in this area.
Zoo can be in the middle of a urbanized city	Wildlife sanctuary provide protection and suitable living conditions to wild animals just like in theirs natural habitat.

(C)

<b>Endangered</b>	<b>Extinct species</b>
It is a population of species that is on the verge of becoming extinct.	It is a population of species that no longer exists.
For examples: Blue whale, tiger, leopard, etc. are examples of endangered species.	For examples: Dodo, passenger pigeon, etc. are examples of extinct species.

(d)

<b>Flora</b>	<b>fauna</b>
It refers to all living plants in a particular area.	It refers to all animals living in a particular area.
For examples: Sal, teak, mango, etc. form the flora of Pachmarhi biosphere reserve.	Leopard, wolf, wild dog, etc. form the fauna of Pachmarhi biosphere reserve.

3. Discuss the effects of deforestation on the following:

- (a) Wild animals
- (b) Environment
- (c) Villages (Rural areas)
- (d) Cities (Urban areas)
- (e) Earth
- (f) The next generation

Answer :

Effects of deforestation on wild animals:

Deforestation deprives wild animals of their natural habitat as result of which they may migrate to other areas or may face extinction.

(b) Effects of deforestation on the environment:

Deforestation is disturbing the whole set of our eco-system, leading to major environmental changes like Global warming. Plants absorb CO<sub>2</sub> from the atmosphere to perform photosynthesis. If plants are destroyed, then the level of CO<sub>2</sub> in the atmosphere will rise. As a result, CO<sub>2</sub> will trap more heat radiations, thereby adding to global warming. An increase in the temperature of the Earth will disturb the natural water cycle. As a result, there will be a change in the rainfall pattern. This could lead to floods or droughts.

(c) Effects of deforestation on villages:

Deforestation results in less rain fall, which means less water for human and crop irrigation. Domestic cattle will have no fodder. Floods and soil erosion caused by deforestation will further adversely effect the rural economy and they may resort to migration to cities in great numbers.

(d) Effects of deforestation on cities:

Deforestation in cities can increase the risk of many natural calamities such as floods and droughts in that area. Also, it can lead to global warming due to an increase in the level of CO<sub>2</sub> in the atmosphere as a result of vehicular and industrial pollution. This increase in temperature can disturb the natural water cycle of an area .

(e) Effects of deforestation on the Earth:

Deforestation is changing earth temperature due to Global Warming. This may endanger the complete eco-system comprising of land, living beings, water, air and other resources.

(f) Effects of deforestation on the next generation:

Deforestation is slowly changing our environmental conditions. It is responsible for global warming, soil erosion, greenhouse effect, drought, floods, and many other global problems. As a result, the next generation will have to face severe consequences of deforestation.

**4. What will happen if:**

- (a) We go on cutting trees.
- (b) The habitat of an animal is disturbed.
- (c) The top layer of soil is exposed.

Answer:

(a) Trees are the most important part of our eco-system directly responsible for recycling of polluted air we breathe, rainfall augmenting our water reserves which are used for drinking as well as crop production, supply of organic raw materials in the form of food, wood and medicine, providing food and shelter to animals and birds. Trees also prevent soil erosion and floods. Cutting of trees in a longer run will result in catastrophic consequences for the existence of mankind along with whole spectrum of diversity evolving living being and plants on this planet earth.

(b) The habitat of an animal provides it with necessities such as shelter, food, and protection. If the habitat of an animal is disturbed, then it will be forced to go to other places in search of food and shelter. The animal could get killed by other animals in this process.

(c) If the top layer of soil is exposed, then it will gradually expose the lower layer of soil, which is hard and rocky in nature. This type of soil is less fertile as it contains less humus. Continued soil erosion will make the land barren or infertile.

#### 5. Answer in brief:

(a) Why should we conserve biodiversity?

Answer:

We should conserve biodiversity, because biodiversity refers to the number and variety of various life forms such as plants, animals, and micro-organisms in an area. Plants and animals depend on each other for survival. Each component of this biodiversity chain is inter-dependent on each other for sustainability.

(b) Protected forests are also not completely safe for wild animals. Why?

Answer:

Protected forests are not completely safe for wild animals because people who live near or adjacent to forests use resources from forests to fulfill their own requirements. In this process, wild animals are killed and sold for lucrative amounts of money.

**(c) Some tribals depend on the jungle. How?**

Answer:

Tribals gather food, fodder, and fallen branches of trees from forests. Hence, they depend on forests for their daily requirements.

**(d) What are the causes and consequences of deforestation?**

Answer:

Causes of deforestation:

(i) Forests are cleared for accommodating expanding urban areas and for fulfilling their ever-increasing requirements.

(ii) Forests are destroyed to clear land for crops and cattle grazing.

(iii) Trees are cut down to be used for firewood.

Consequences of deforestation:

(i) Soil erosion

(ii) Loss of biodiversity

(iii) Floods and droughts

(iv) Climate change due to global warming

(v) Disruption of water cycle (

**e) What is Red Data Book?**

Answer :

Red Data Book is a source book that maintains an international list of all endangered animal and plant species. This book is maintained by IUCN (International Union for Conservation of Nature and Natural resources)

**(f) What do you understand by the term migration?**

Answer :

Migration is the phenomenon of movement of a species from its own habitat to some other habitat for a particular time period every year for a specific purpose like breeding.

**6. In order to meet the ever-increasing demand in factories and for shelter, trees are being continually cut. Is it justified to cut trees for such projects?**

Discuss and prepare a brief report.

Answer :

No. It is not at all justified to cut trees to meet the ever increasing demands of human population. Forests are the habitat of several organisms including wild animals. They provide us with good quality air as they give out O<sub>2</sub> and absorb the harmful CO<sub>2</sub> gas from the atmosphere. In the process, they prevent the excessive heating of the atmosphere. They prevent soil erosion and natural calamities such as floods and droughts. They increase the fertility of the soil and help conserve biodiversity. The cutting of forests to meet the demands of growing human population will lead to global warming, soil erosion, greenhouse effect, droughts, floods, and many more problems. The destruction of forests will disturb the balance of nature. Hence, forests must be conserved.

**7. How can you contribute to the maintenance of green wealth of your locality?**

Answer :

- We can plant trees in open spaces, park, along the side of road and motivate others.
- We can make use of roof water or water from kitchen for water harvesting to recharge the ground water table.
- We can recycle our organic waste from kitchen for making compost and use it in our kitchen garden or plants.
- We can reduce use of paper .We can save it, reuse used paper and recycle it.

**8. Explain how deforestation leads to reduced rainfall.**

Answer :

Deforestation increases the temperature and pollution level on the earth. It increases the level of carbon dioxide in the atmosphere. Ground water level also gets lowered. Deforestation disturbs the whole eco-system. As we know, plants need carbon dioxide for photosynthesis. Fewer trees would mean that less carbon dioxide will be used up resulting in its increased amount in the atmosphere. This will lead to global warming as carbon dioxide traps the heat rays reflected by the earth. The increase in temperature on the earth disturbs the water cycle and may reduce rainfall.

**9. Find out the information about the national parks in your state. Identify and show their location on the outline map of India.**

Answer :

Our state Punjab has just one national park.

Harike Wetland also known as "Hari-ke-Pattan", with the Harike Lake in the deeper part of it, is the largest wetland in northern India in the Ferozepur district of the Punjab state in India. The wetland and the lake were formed by constructing the head works across the Sutlej river, in 1953. The headworks is located downstream of the confluence of the Beas and Sutlej rivers. The rich biodiversity of the wetland which plays a vital role in maintaining the precious hydrological balance in the catchment with its vast concentration of migratory fauna of waterfowls including a number of globally threatened species (stated to be next only to the Keoladeo National Park near Bharatpur) has been responsible for the recognition accorded to this wetland in 1990, by the Ramsar Convention, as one of the Ramasar sites in India, for conservation, development and preservation of the ecosystem

**10. Why should paper be saved? Prepare a list of ways by which you can save paper.**

Answer :

Paper should be saved because it takes around seventeen full grown trees to make one ton of paper. Trees, as we know, are important to maintain a balance of nature. Therefore, in order to save trees and prevent the impact of their loss on living organisms, we need to save paper.

Ways by which paper can be saved:

- (i) Collect used paper and recycle it.
- (ii) Use both sides of a paper for writing.
- (iii) Spread awareness about the importance of paper.
- (iv) Use paper intelligently.

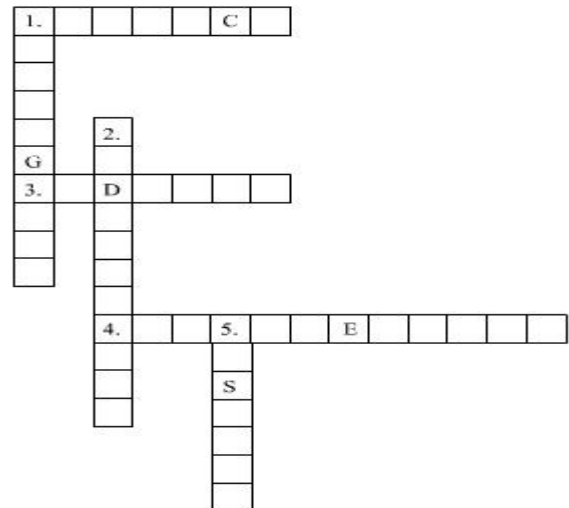
**11. Complete the word puzzle:**

Down

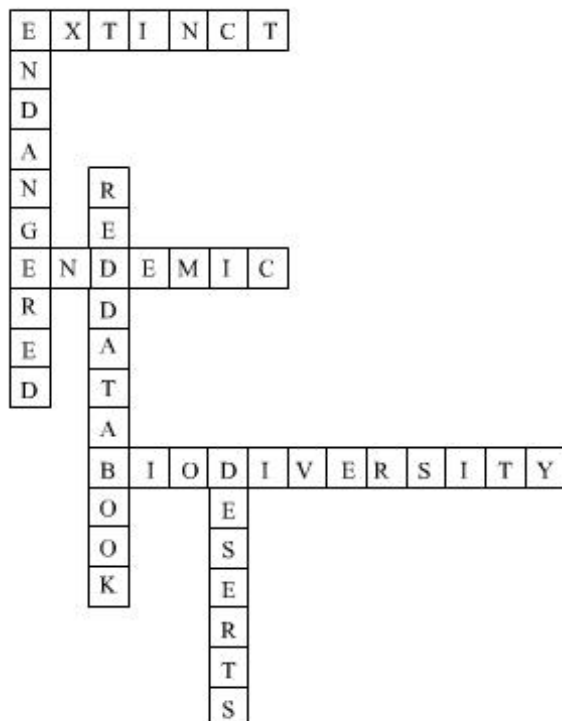
1. Species on the verge of extinction.
2. A book carrying information about endangered species.
5. Consequence of deforestation.

Across

1. Species which have vanished.
3. Species found only in a particular habitat.
4. Variety of plants, animals and microorganisms found in an area.



Answer :



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