

Endangered and Endemic species of India

ENDANGERED SPECIES OF INDIA

A plant, animal or microorganism that is in immediate risk of biological extinction is called endangered species or threatened species.

In India, 450 plant species have been identified as endangered species. 100 mammals and 150 birds are estimated to be endangered.

India's biodiversity is threatened primarily due to:

1. Habitat destruction
2. Degradation and
3. Over exploitation of resources

The RED-data book contains a list of endangered species of plants and animals. It contains a list of species of that are endangered but might become extinct in the near future if not protected.

Some of the rarest animals found in India are:

1. Asiatic cheetah
2. Asiatic Lion
3. Asiatic Wild Ass
4. Bengal Fox
5. Gaur
6. Indian Elephant
7. Indian Rhinoceros
8. Marbled Cat
9. Markhor

Extinct species is no longer found in the world.

Endangered or threatened species is one whose number has been reduced to a critical number. Unless it is protected and conserved, it is in immediate danger of extinction.

Vulnerable species is one whose population is facing continuous decline due to habitat destruction or over exploitation. However, it is still abundant.

Rare species is localized within a restricted area or is thinly scattered over an extensive area.

Such species are not endangered or vulnerable.

A few endangered species in the world are listed below:

1. West Virginia Spring Salamander (U.S.A)
2. Giant Panda (China)
3. Golden Lion Tamarin (Brazil)
4. Siberian Tiger (Siberia)
5. Mountain Gorilla (Africa)
6. Pine Barrens Tree Frog (Male)
7. Arabian Oryx (Middle East)
8. African Elephant (Africa)

Other important endangered species are:

1. Tortoise, Green sea Turtle , Gharial, Python (Reptiles)
2. Peacock, Siberian White Crane, Pelican, Indian Bustard (Birds)
3. Hoolock gibbon, Lion-tailed Macaque, Capped monkey, Golden monkey (Primates)
4. Rauwolfia serpentina (medicinal plant), Sandal wood tree, etc

FACTORS AFFECTING ENDANGERED SPECIES

1. Human beings dispose wastes indiscriminately in nature thereby polluting the air, land and water. These pollutants enter the food chain and accumulate in living creatures resulting in death.
2. Over-exploitation of natural resources and poaching of wild animals also leads to their extinction.
3. Climate change brought about by accumulation of greenhouse gases in the atmosphere. Climate change threatens organisms and ecosystems and they cannot adjust to the changing environmental conditions leading to their death and extinction.

An international treaty to help protect endangered wildlife is, "Convention on International Trade in Endangered Species 1975" (CITES). This treaty is now signed by 160 countries.

1. CITES lists 900 species that cannot be commercially traded as live specimens or wildlife products as they are in danger of extinction.
2. CITES restricts trade of 2900 other species as they are endangered.

DRAWBACKS OF CITES

1. This treaty is limited as enforcement is difficult and convicted violators get away by paying only a small fine.
2. Member countries can exempt themselves from protecting any listed species.

Endemic species of India

Species that are found only in a particular region are known as endemic species. Almost 60% the endemic species in India are found in Himalayas and the Western Ghats. Endemic species are mainly concentrated in:

1. North-East India
2. North-West Himalayas
3. Western Ghats and
4. Andaman & Nicobar Islands.

Examples of endemic Flora species are

1. Sapria Himalayana
2. Ovaria Lurida
3. Nepenthis khasiana etc

Endemic fauna of significance in the western ghats are:

1. Lion tailed macaque
2. Nilgiri langur
3. Brown palm civet and
4. Nilgiri tahr

Factors affecting endemic species:

1. Habitat loss and fragmentation due to draining and filling of inland wetlands.
2. Pollution also plays an important role.

Ex:

1. Frog eggs, tadpoles and adults are extremely sensitive to pollutants especially pesticides.
2. Over-hunting and
3. Populations can be adversely affected by introduction of non active predators and competitors. Disease producing organisms also play an important adversary in reducing populations of endemic species.