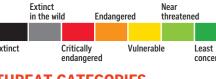
ENDANGERED IN SUMATRA Sumatran elephant (Elephas maximus sumatrensis) With 201 mammal species and 580 bird species, the forests of Sumatra and Borneo **Critically endangered** are some of the world's most biologically diverse habitats. However, over the past 22 years, about 12 million hectares — or 50 per cent — of the forests have been lost. • Population: 2,400 to 2,800. Found in Sumatra, Indonesia. About 70 per cent of its habitat was destroyed in about 25 years. As a result of the destruction of their natural habitat, they often come into contact with human settlements. Sometimes the people affected retaliate by shooting or poisoning the In 2012, its conservation status was changed from "endangered" to "critically endangered" because its population was halved in about 25 years. Without their mothers, orphaned baby elephants are unable to fend for themselves Poachers shoot and/or kill orang utan mothers in order to capture their infants to be trafficked for the illegal pet trade. Sumatran orang utan (Pongo abelii) **Critically endangered** Vulnerable to poaching Population: About 7,300 for their tusks to be sold Restricted range in North Sumatra and Aceh, Indonesia. to the illegal ivory trade. Regular widespread forest fires destroy orang utan habitats at an extremely high rate. Thousands of orang utans are thought to have burned to death, unable to escape the flames due to their slow-moving nature. Its population has declined by 85 per cent since 1900.

STATUS CATEGORIES

The population status and threats to the survival of each species are evaluated by the International Union for the Conservation of Nature (IUCN) every five years. Based on that information, each species will be assigned to a category by the IUCN.



Climate change

THREAT CATEGORIES



at the wrong time.

Affects species indirectly by causing seasonal events to happen

Examples of seasonal events: Migration and reproduction.



Habitat loss and degradation

 Modification of the living environment of a species that results in reduced quality or Examples: Logging,

fragmentation of rivers and unsustainable agriculture.

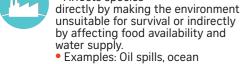


Invasive species and disease Introduction of new species and diseases previously not present in

the environment negatively impacts native species. **Pollution**

• Affects species

water supply. • Examples: Oil spills, ocean acidification, noise pollution and air pollution.



Species overexploitation

 Unsustainable hunting, poaching and harvesting are direct forms of

overexploitation. Indirect overexploitation can also happen in cases where non-target species are killed unintentionally.

BIGGEST THREATS



Terrestrial species Habitat loss and degradation



Freshwater species Habitat loss and degradation

Marine species

Species overexploitation

OTHER ASIAN WILDLIFE THREATENED WITH EXTINCTION

Sunda pangolin

(Manis javanica)

Philippine eagle (Pithecophaga jefferyi)

Critically endangered 250 to 750 eagles are left.

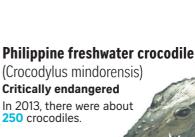
Critically endangered Based on reported seizures, 116,990 to 233,980



Sumatran tiger

(Panthera tigris ssp. sumatrae) **Critically endangered**

About 400 Sumatran tigers remain in patches of forests in





THE SIXTH MASS EXTINCTION

Mass extinctions are defined by the loss of a vast amount of species in a relatively short time. There has only been five occurrences of mass extinctions in the past 540 million years. In the last few centuries, the earth has

experienced loss of species at an exceptionally high and increasing rate. 310 to 320 MYA First reptiles

400 MYA

End of 1st

mass extinction

500 MYA

First vertebrates

359 MYA End of 2nd mass extinction

> Devonian period, 416 to 359.2 MYA. Also known as the age of fishes, as there were abundant fish species living in the water.

Cambrian period, about 545 to 495 MYA. Also known as the most intense increase in evolution, which led to an incredible diversity consisting of more than 17,000 species.

MYA: Millions of years ago

EXTINCTION RATES All vertebrates

1600

1700

1800

1900 2014

Permian period, 299 to 251 MYA.

Known as the worst extinction event in the planet's history, more than

became extinct due to the emerging

super continent, resulting in extreme

90 per cent of marine species and

70 per cent of terrestrial species

climate changes.

Long-term rate of extinction Cumulative extinctions as % of IUCN-evaluated species 1.2

251 MYA

End of 3rd

mass extinction

Humans

210 MYA

First mammals

End of 4th

200 MYA

mass extinction

Pleistocene

230 to 65 MYA

Dinosaurs

100 MYA

Anthropocene (Age of humans)

65 MYA

End of 5th

mass extinction

Cenozoic

Holocene

Present

DECLINING SPECIES

The living planet index (LPI) measures biodiversity by gathering population data of various vertebrate species and calculating an average change in abundance over time.



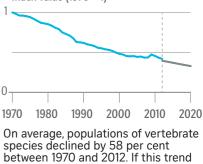
Terrestrial species 38% decline



Freshwater species 81% decline



 LPI extrapolated to 2020 under a business as usual scenario Index value (1970 = 1)



continues, vertebrate populations may decline by an average of 67 per cent by 2020, compared with 1970.

Sources: BBC, LIVING PLANET REPORT 2016 (WWF), NATIONAL GEOGRAPHIC, THE IUCN RED LIST OF THREATENED SPECIES, WWF STRAITS TIMES GRAPHICS: GISELLE LIM, DENISE NG & RACHEL CHEO