

Evolution and Inheritance

Recap:

- Fossils are the remains or traces of plants and animals.
- All living things live in a habitat.
- Changing a habitat has effects on living things.
- The main reasons for habitat loss are: deforestation, pollution, urbanisation and invasive species.

Crucial Knowledge:

- Evolution is a process of change that takes place over many generations, during which species of animals, plants, or insects slowly change some of their physical characteristics. This is because offspring are not identical to their parents.
- Natural selection occurs when there is competition to survive.
- Inheritance is when characteristics are passed on from generation to the next.
- Adaptation is when animals and plants have evolved so that they have changed to survive in their environments.

Extended Knowledge:

- Differences within a species (for example between parents and offspring) can be caused by inheritance and mutations.
- Mutations in characteristics are not inherited from the parents and appear as new characteristics.
- Evidence of evolution comes from fossils
- Some environments provide challenges yet some animals and plants have adapted to survive there
- Sometimes adaptations can be disadvantageous. One example of this can be the dodo, which became extinct as it lost its ability to fly through evolution. Flying was unnecessary for the dodo as it had lived for so many years without predators, until its native island became inhabited.



