**Biodiversity**

Multiple Choice

1. Define the term biodiversity.
2. The range of different species in an ecosystem.
3. The number of organisms in one species.
4. The number of organisms in one biome.
5. The range of different species in a zoo.
6. Clarify what it means for an ecosystem to have high biodiversity.
7. Species interact with each other.
8. A low number of species interact with each other.
9. A high number of species interact with each other.
10. Species interact with each from high in the sky.
11. Clarify what does it mean for an ecosystem to have low biodiversity.
12. A high number of species interact with each other.
13. A low number of species interact with each other.
14. Species interact with each other.
15. Species interact with each from low in the ground.
16. A lethal disease hits an ecosystem.

Predict what would make the ecosystem less likely to be wiped out.

1. If it had high biodiversity
2. If it had low biodiversity
3. Identify which of these environments tend to have high biodiversity. Select all that apply.

Select ALL correct options

1. Rainforests
2. The Moon
3. Coral Reef
4. Deserts
5. Identify which of these environments tend to have low biodiversity. Select all that apply.

Select ALL correct options

1. Coral reefs
2. Rainforests
3. Deserts
4. Tundra
5. The Tasmanian tiger (Thylacinus cynocephalus) is an animal that was once alive, but has died out.

Identify what do we call the death of all members of a species.

1. Extinction
2. Parasitism
3. Mutualism
4. Predation
5. The boa constrictor eats a range of other animals, including bats and frogs.

If the bats in its habitat were to be wiped out by a deadly gas cloud, predict how this would likely affect the boa constrictor.

1. It would die from lack of food.
2. It would eat more frogs.
3. It would become allergic to bats.
4. It would go down a trophic level.
5. The thorny dragon (Moloch horridus) lives in the Australian outback and only eats ants. If the ants in its habitat were to be wiped out by a virus, predict how this would likely affect the thorny dragon.
6. It would become allergic to ants.
7. It would start eating sand.
8. It would die from lack of food.
9. It would go up a trophic level.
10. The orca or killer whale (Orcinus orca) is an apex predator. It feeds on seals and other marine animals. If the orca were to be wiped out by a meteorite impact, predict how this would likely affect the seals it eats.
11. Their populations would rapidly expand.
12. They would become allergic to seafood.
13. They would die from lack of predation.
14. They would not be affected at all.

Short Answer

1. **Many species that once lived on Earth no longer exist. They are extinct.**

**Define extinction in your own words, then provide an example of an extinct species.**

1. **In ecology, biodiversity describes the number and variety of species living in an ecosystem.**

**Explain why high biodiversity is important for the survival of species. Consider the following in your explanation:**

1. **The potential effects of one species extinction in an ecosystem with high biodiversity;**
2. **The potential effects of one species extinction in an ecosystem with low biodiversity.**