

In your textbook, read about what ecology is and about aspects of ecological study.

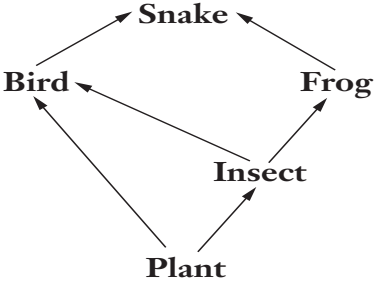
Use each of the terms below just once to complete the passage.

ecology biotic factors nonliving environments atmosphere
humans organisms soil biosphere abiotic factors

Living organisms in our world are connected to other **(1)** _____ in a variety of ways. The branch of biology called **(2)** _____ is the scientific study of interactions between organisms and their **(3)** _____, including relationships between living and **(4)** _____ things.

All living things on Earth can be found in the **(5)** _____, the portion of Earth that supports life. It extends from high in the **(6)** _____ to the bottom of the oceans. Many different environments can be found in the biosphere. All living organisms found in an environment are called **(7)** _____. Nonliving parts of an environment are called **(8)** _____. For example, whales, trees, and **(9)** _____ are biotic factors. Ocean currents, temperature, and **(10)** _____ are abiotic factors.

Answer the questions below. Use the diagram of a food web to answer questions 1–7.



- 1. How many food chains make up the food web?

- 2. Which organism is an herbivore?

- 3. Which organism is an autotroph?

- 5. Which organism is an omnivore?

- 6. Which organisms belong to more than one food chain?

- 7. Which organism belongs to more than one trophic level?

- 8. What are decomposers? Where would decomposers appear in this food web?

- 9. What does a pyramid of energy show about the amount of energy available at different trophic levels of a food chain?