

Reading Comprehension 1

• Paragraph: Water is one of the most important substances on Earth. It covers about 71% of our planet's surface, mostly found in oceans. Water can also be found in rivers, lakes, and underground reservoirs. Plants and animals depend on water to survive, and humans use it for drinking, bathing, and agriculture.

Fresh water is limited, so it must be conserved carefully. The water cycle describes how water evaporates from oceans and lakes, forms clouds, and falls back as rain or snow. This cycle helps distribute fresh water around the globe, making life possible in many places.

– **Question:** Which part of Earth holds most of its water?

- Option A: Rivers
- Option B: Lakes
- Option C: Oceans
- Option D: Underground reservoirs

— Correct Answer: C

– **Question:** What percentage of Earth's surface is covered by water?

- Option A: 50%
- Option B: 71%
- Option C: 85%
- Option D: 95%

— Correct Answer: B

– **Question:** What is the water cycle?

- Option A: The movement of water between different states and locations
- Option B: The process of making water artificially
- Option C: The freezing of water in glaciers only
- Option D: The movement of water in pipes under a city

— Correct Answer: A

– **Question:** Why is fresh water important?

- Option A: It is unlimited
- Option B: It is needed by animals, plants, and humans
- Option C: It has no effect on agriculture
- Option D: It can only be found in oceans

— Correct Answer: B

– **Question:** Which statement about the water cycle is correct?

- Option A: It never involves oceans
- Option B: Rainfall is part of the cycle
- Option C: The cycle does not produce fresh water
- Option D: Evaporation is not a part of the cycle

– Correct Answer: B

Reading Comprehension 2

• Paragraph: Photosynthesis is the process through which green plants and some other organisms make their own food. They use sunlight, carbon dioxide from the air, and water from the soil. During this process, they release oxygen into the atmosphere, which is vital for humans and other animals.

The green pigment in plants, called chlorophyll, helps absorb sunlight. The food produced by photosynthesis is stored in plants' leaves, stems, and roots. This food provides energy for the plant and for other organisms that consume the plant.

– **Question:** What do plants require for photosynthesis?

- Option A: Carbon dioxide, water, and sunlight
- Option B: Oxygen and nitrogen only
- Option C: Sugar and chlorophyll only
- Option D: Heat and proteins

– Correct Answer: A

– **Question:** Which molecule in plants absorbs sunlight?

- Option A: Oxygen
- Option B: Carbon dioxide
- Option C: Chlorophyll
- Option D: Glucose

– Correct Answer: C

– **Question:** What is released by plants during photosynthesis?

- Option A: Carbon dioxide
- Option B: Water
- Option C: Sugar
- Option D: Oxygen

– Correct Answer: D

– **Question:** Where is the food produced by photosynthesis stored?

- Option A: In the air
- Option B: In plant leaves, stems, and roots
- Option C: In sunlight
- Option D: It is not stored at all

– Correct Answer: B

– **Question:** Why is photosynthesis important for animals?

- Option A: It provides food and oxygen
- Option B: It only creates shade
- Option C: It removes all water from soil
- Option D: It reduces plant growth

– Correct Answer: A

Reading Comprehension 3

• Paragraph: Our solar system consists of the Sun and all the objects that orbit around it. These objects include planets, dwarf planets, moons, asteroids, and comets. The Sun is at the center, and its gravity keeps the planets in their orbits. The planets vary greatly in size and composition, from rocky worlds like Earth to gas giants like Jupiter.

Earth is the third planet from the Sun and is home to a diverse range of life forms. It has one moon, while some other planets like Jupiter have many moons. Scientists study other planets to learn more about how the solar system formed and whether life might exist elsewhere.

– **Question:** Which celestial body is at the center of the solar system?

- Option A: Earth
- Option B: Jupiter
- Option C: The Sun
- Option D: The Moon

– Correct Answer: C

– **Question:** Which planet is known to have many moons?

- Option A: Mercury
- Option B: Jupiter
- Option C: Earth
- Option D: Mars

— Correct Answer: B

– **Question:** Which statement is true about Earth?

— Option A: It is the fifth planet from the Sun

— Option B: It has multiple moons

— Option C: It is a gas giant

— Option D: It supports a diverse range of life

— Correct Answer: D

– **Question:** What keeps planets in orbit around the Sun?

— Option A: Gravity of the Sun

— Option B: Magnetic force from Earth

— Option C: Random movement

— Option D: The wind in space

— Correct Answer: A

– **Question:** Why do scientists study other planets?

— Option A: To learn about Earth's future

— Option B: To see if they can find gas giants

— Option C: To understand solar system formation and potential life elsewhere

— Option D: To block sunlight

— Correct Answer: C

Reading Comprehension 4

• Paragraph: Cells are the basic units of life. Every living organism, from tiny bacteria to huge whales, is made up of cells. Cells come in different shapes and sizes, depending on their function. Some organisms, like bacteria, are single-celled, while others, like humans, have trillions of cells working together.

Cells perform various tasks that keep an organism alive, such as converting nutrients into energy, growing, and reproducing. Within cells, there are specialized structures called organelles. For example, the nucleus contains genetic material, and mitochondria help produce energy for the cell.

– **Question:** What are the basic units of life?

— Option A: Tissues

— Option B: Cells

— Option C: Molecules

— Option D: Organs

— Correct Answer: B

- **Question:** Which organisms have only one cell?
 - Option A: Fish
 - Option B: Bacteria
 - Option C: Birds
 - Option D: Mammals

 - Correct Answer: B

 - **Question:** How many cells can a human body have?
 - Option A: Just a single cell
 - Option B: Trillions of cells
 - Option C: About a hundred cells
 - Option D: No cells at all

 - Correct Answer: B

 - **Question:** What does the nucleus contain?
 - Option A: Genetic material
 - Option B: Water only
 - Option C: Nutrients
 - Option D: Air

 - Correct Answer: A

 - **Question:** Which organelle helps produce energy in a cell?
 - Option A: Nucleus
 - Option B: Ribosome
 - Option C: Mitochondrion (Mitochondria)
 - Option D: Cell membrane

 - Correct Answer: C
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Reading Comprehension 5

• Paragraph: Animals are classified into different groups based on shared characteristics. Vertebrates are animals that have backbones, such as fish, amphibians, reptiles, birds, and mammals. Invertebrates do not have backbones; examples include insects, worms, and jellyfish. This classification helps scientists study the diversity of animal life.

Animals also differ in how they reproduce, where they live, and how they obtain food. Some animals are herbivores and eat only plants, while others are carnivores and eat only other animals. Many, like humans, are omnivores and eat both plants and animals.

- **Question:** Which animals have backbones?
 - Option A: Invertebrates
 - Option B: Vertebrates
 - Option C: Herbivores
 - Option D: Carnivores

 - Correct Answer: B

 - **Question:** Which of the following is NOT an invertebrate?
 - Option A: Fish
 - Option B: Insect
 - Option C: Worm
 - Option D: Jellyfish

 - Correct Answer: A

 - **Question:** Which group includes amphibians and birds?
 - Option A: Vertebrates
 - Option B: Invertebrates
 - Option C: Herbivores
 - Option D: Carnivores

 - Correct Answer: A

 - **Question:** What is true about omnivores?
 - Option A: They eat only plants
 - Option B: They do not eat animals
 - Option C: They eat both plants and animals
 - Option D: They cannot digest plant materials

 - Correct Answer: C

 - **Question:** Why do scientists classify animals?
 - Option A: To reduce the number of species
 - Option B: To increase the confusion
 - Option C: To better study and understand animal diversity
 - Option D: Because animals asked them to

 - Correct Answer: C
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Reading Comprehension 6

- **Paragraph:** Ecosystems consist of all the living and nonliving things in a given area. Plants, animals, and microorganisms interact with each other and with physical elements like soil, water, and climate. These interactions help cycle nutrients and energy throughout the ecosystem. A change in one part of the ecosystem can affect other parts.

Human activities such as deforestation, pollution, and climate change have significant impacts on ecosystems. Protecting ecosystems is crucial for maintaining biodiversity, ensuring clean water, and providing resources like food and medicine. Conservation efforts aim to preserve natural habitats and restore damaged environments.

– **Question:** What is an ecosystem?

- Option A: A group of the same species
- Option B: All living and nonliving things in an area interacting together
- Option C: Only the plants in a given area
- Option D: A system made of computers and machines

– Correct Answer: B

– **Question:** Which of the following is NOT a physical element of an ecosystem?

- Option A: Soil
- Option B: Water
- Option C: Temperature
- Option D: Animals

– Correct Answer: D

– **Question:** How do human activities affect ecosystems?

- Option A: They have no effect
- Option B: They can cause deforestation and pollution
- Option C: They always benefit the ecosystem
- Option D: They only add more species

– Correct Answer: B

– **Question:** Why is biodiversity important?

- Option A: It provides a variety of resources for survival
- Option B: It only makes nature look prettier
- Option C: It has no connection to ecosystem health
- Option D: It reduces the number of species

– Correct Answer: A

– **Question:** Which of the following is a goal of conservation efforts?

- Option A: To completely remove wildlife

- Option B: To preserve natural habitats
- Option C: To pollute water sources
- Option D: To harm endangered species
- Correct Answer: B

Reading Comprehension 7

• Paragraph: Genetics is the study of heredity, or how traits are passed from one generation to the next. Gregor Mendel, known as the “Father of Genetics,” conducted experiments with pea plants in the 19th century. He discovered that traits like flower color and seed shape were determined by factors—now called genes—that come in pairs.

These genes can have different versions, known as alleles. An organism’s traits depend on which alleles it inherits from its parents. Modern genetics has expanded to include studies of DNA, genetic engineering, and the role of genes in diseases.

– **Question:** Who is known as the “Father of Genetics”?

- Option A: Charles Darwin
- Option B: Gregor Mendel
- Option C: Louis Pasteur
- Option D: Albert Einstein

— Correct Answer: B

– **Question:** What did Mendel study to understand heredity?

- Option A: Fruit flies
- Option B: Pea plants
- Option C: Human cells
- Option D: Birds

— Correct Answer: B

– **Question:** What are alleles?

- Option A: Different versions of a gene
- Option B: A type of nutrient
- Option C: Entire chromosomes
- Option D: A scientific tool

— Correct Answer: A

– **Question:** Which statement is correct about how traits are passed?

- Option A: Traits are passed only through the mother
- Option B: Traits are not inherited at all

- Option C: Traits depend on which alleles offspring receive
- Option D: All offspring are identical to parents
- Correct Answer: C

– **Question:** What is a modern focus of genetics?

- Option A: The role of genes in diseases
 - Option B: Weather patterns
 - Option C: Ancient star maps
 - Option D: Political systems
 - Correct Answer: A
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Reading Comprehension 8

• Paragraph: The periodic table organizes chemical elements by their atomic number, electron configurations, and recurring chemical properties. Each element is represented by a unique symbol, and elements in the same column (group) share similar properties. For example, Group 1 elements (alkali metals) are highly reactive and readily lose one electron to form positive ions.

The periodic table has helped scientists predict the properties of elements before they were discovered. Elements are arranged in rows (periods) where atomic numbers increase from left to right. Understanding this arrangement helps chemists and physicists study chemical reactions and discover new materials.

– **Question:** What does the periodic table organize?

- Option A: Planets
- Option B: Chemical elements
- Option C: Stars
- Option D: Animals
- Correct Answer: B

– **Question:** What do elements in the same group (column) share?

- Option A: Exactly the same masses
- Option B: Similar chemical properties
- Option C: Identical colors
- Option D: The same number of neutrons
- Correct Answer: B

- **Question:** Which group contains highly reactive metals that lose one electron?
 - Option A: Group 1 (alkali metals)
 - Option B: Group 2 (alkaline earth metals)
 - Option C: Group 17 (halogens)
 - Option D: Group 18 (noble gases)

 - Correct Answer: A

 - **Question:** Why is the periodic table useful?
 - Option A: It organizes living organisms
 - Option B: It predicts properties of unknown elements
 - Option C: It only tracks changes in temperature
 - Option D: It has no scientific importance

 - Correct Answer: B

 - **Question:** How are elements arranged in periods (rows)?
 - Option A: By decreasing atomic number
 - Option B: Alphabetically by name
 - Option C: By increasing atomic number from left to right
 - Option D: Randomly

 - Correct Answer: C
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Reading Comprehension 9

• Paragraph: Evolution is the process by which species of organisms change over time through variations in their genetic makeup. Natural selection, a concept introduced by Charles Darwin, plays a key role in evolution. In natural selection, individuals with traits better suited to their environment are more likely to survive and reproduce, passing on those advantageous traits.

Over many generations, these changes accumulate, leading to the emergence of new species. Fossil records, genetic studies, and observations of living organisms provide evidence for evolution. This concept helps us understand the diversity of life on Earth and how organisms adapt to changing environments.

- **Question:** What is evolution?
- Option A: The sudden appearance of new species overnight
- Option B: A process where species change over time through genetic variations
- Option C: An event caused by weather changes
- Option D: The disappearance of traits in a single day

— Correct Answer: B

– **Question:** Who introduced the concept of natural selection?

— Option A: Isaac Newton

— Option B: Charles Darwin

— Option C: Galileo Galilei

— Option D: Nikola Tesla

— Correct Answer: B

– **Question:** What increases an organism's likelihood of survival in natural selection?

— Option A: Random body shapes

— Option B: Traits well-suited to its environment

— Option C: No traits at all

— Option D: Traits that always remain the same

— Correct Answer: B

– **Question:** Which type of evidence supports evolution?

— Option A: Fossil records

— Option B: Astrological charts

— Option C: Superstitions

— Option D: Newspaper articles

— Correct Answer: A

– **Question:** How do new species arise over time?

— Option A: By immediate creation

— Option B: By the extinction of all organisms

— Option C: Through the accumulation of genetic changes across many generations

— Option D: Through sudden, random events in one generation

— Correct Answer: C

Reading Comprehension 10

• Paragraph: The universe encompasses all of space, time, matter, and energy. Scientists believe it began about 13.8 billion years ago with the Big Bang, a massive expansion of space from an extremely hot and dense state. Evidence for the Big Bang includes the observation that galaxies are moving away from each other and the discovery of cosmic microwave background radiation.

Modern astronomy uses powerful telescopes and advanced instruments to study distant galaxies, black holes, and other cosmic phenomena. Ongoing research explores the universe's expansion rate, the nature of dark matter, and the role of dark energy, which makes up most of the universe. Our understanding of the cosmos continues to evolve with new data and discoveries.

– **Question:** What event do scientists believe started the universe?

- Option A: The formation of Earth
- Option B: The Big Bang
- Option C: The collision of two galaxies
- Option D: The birth of our Sun

– Correct Answer: B

– **Question:** How old is the universe believed to be?

- Option A: 13.8 million years
- Option B: 13.8 billion years
- Option C: 4.5 billion years
- Option D: 1 trillion years

– Correct Answer: B

– **Question:** Which of the following provides evidence for the Big Bang?

- Option A: Cosmic microwave background radiation
- Option B: The shape of Earth
- Option C: Meteors entering the atmosphere
- Option D: The presence of volcanoes

– Correct Answer: A

– **Question:** What do astronomers use to study the universe?

- Option A: Microscopes
- Option B: Telescopes and advanced instruments
- Option C: Simple lenses only
- Option D: Naked-eye observation exclusively

– Correct Answer: B

– **Question:** What are scientists currently researching about the universe?

- Option A: The existence of only Earth
- Option B: The nature of dark matter and dark energy
- Option C: That galaxies are not moving at all
- Option D: How to stop the expansion of space

— Correct Answer: B