

C11 Earth's atmosphere

Questions	Answers
1. What is the composition of the atmosphere?	about four-fifths (approximately 80%) nitrogen about one-fifth (approximately 20%) oxygen small proportions of other gases (carbon dioxide, water vapour and noble gases)
2. What planets was Earth's early atmosphere most like?	Venus or Mars
3. What did the early atmosphere mostly consist of?	Carbon dioxide and water vapour with little or no oxygen gas.
4. What is the equation for photosynthesis?	Carbon dioxide + water → glucose + oxygen
5. How did oxygen increase?	Algae and plants decreased the percentage of carbon dioxide in the atmosphere by photosynthesis.
6. How was carbon dioxide reduced?	Carbon dioxide was also decreased by the formation of sedimentary rocks in the oceans and fossil fuels that contain carbon
7. What are the greenhouse gases?	Water vapour, carbon dioxide and methane
8. What is the purpose of the greenhouse gases?	Greenhouse gases in the atmosphere maintain temperatures on Earth high enough to support life.
9. Name two ways humans are increasing the amount of greenhouse gases in the atmosphere	Burning fossil fuels Deforestation
10. What are the potential effects of global climate change?	rising sea levels, threats to ecosystems, and different patterns of food production around the world.
11. What does the term carbon footprint mean?	the total amount of carbon dioxide and other greenhouse gases emitted over the full life cycle of a product, service or event
12. What is global dimming?	a process that reduces the amount of sunlight reaching the Earth's surface. It is caused by particulates in the atmosphere reflecting light back into space before it can reach Earth
13. What is the problem with carbon monoxide?	Carbon monoxide is a toxic gas. It is colourless and odourless and so is not easily detected.
14. What do Sulfur dioxide and oxides of nitrogen cause?	respiratory problems in humans and cause acid rain.
15. What problem do Particulates cause?	Particulates cause global dimming and health problems for humans.