

3. We believe preserving environmental balance ... the quality of life.
4. This software will ... us to track some animal species.
5. The council is ... the protection of the wildlife.
6. The nuclear plant is ... by a high fence.

5. a) Work in pairs. Complete the column *Cause* with the information from the lesson. With your partner discuss possible effects of these environmental issues and make notes in column *Effect*.

| Problem | Cause | Effect |
|----------------------|-------|--------|
| 1. climate change | ... | ... |
| 2. pollution | ... | ... |
| 3. nuclear waste | ... | ... |
| 4. waste | ... | ... |
| 5. deforestation | ... | ... |
| 6. animal extinction | ... | ... |

b) Use the table to tell your class about environmental issues.

LESSON 2. Climate change

Communicative area: speaking about climate change, speaking about unreal past (lost opportunities)

Active grammar: Conditional III

Active vocabulary: greenhouse effect, global warming, carbon footprint, carbon dioxide, to be absorbed, to be released, fuel, emission, to melt, to rise, to reduce, to increase

1. Work in pairs and answer the questions.

What is your favourite season?

What kind of weather do you like?

Do you think the weather is changing? If yes, can you give any examples?

Do you know about any countries that have suffered extreme weather conditions recently?

2. a) Look at the picture. Try to explain it.



b) Read the introduction to the quiz about climate change and check your idea.

This is a carbon footprint. It's the term used to describe the number of gases produced by people's activities and released into the atmosphere. The gases include CO₂ (carbon dioxide), methane, nitrous oxide, etc. Do the quiz to see how much you know about climate change and people's impact on the environment.



c) Answer the questions in the quiz. Check your answers on page 92.

- Where does the Earth get energy to keep warm?
 - from the world ocean;
 - from the Sun;
 - from the Moon.
- When there is too much heat on the Earth...
 - some of it should be **released** back into space;
 - all of it must be absorbed by the Earth;
 - it stays in the upper layers of the atmosphere.
- What might happen if there is too much carbon dioxide in the atmosphere?
 - the gases won't let the heat reach the Earth and the temperature will go down;
 - the gases will trap the heat creating the greenhouse effect and **increasing** world temperatures;
 - the gasses will lower the sea level and **reduce** marine biodiversity.

4. The biggest amount of carbon dioxide is released into the atmosphere...
 - a) when it rains;
 - b) when **fuel** is burnt;
 - c) when plants grow.
5. The main way carbon dioxide is **absorbed**...
 - a) by some animals species to breathe;
 - b) by plants and phytoplankton for photosynthesis;
 - c) by factories to produce cars.
6. If the world temperature **rises** too much, one of the most dramatic results of global warming will be that:
 - a) some areas will actually get forever cold making them uncomfortable to live in;
 - b) warmer weather all over the world will boost tourism;
 - c) glaciers will **melt**, the sea level will rise and a lot of coastal regions will drown.
7. Some scientists say we wouldn't have damaged the environment so much if...
 - a) we had invested more money in agriculture;
 - b) we hadn't started the Industrial Revolution in the 18th century;
 - c) we had made the **emissions** of greenhouse gasses go into the outer space.
8. If the climate changed enough, ...
 - a) a lot of areas would become unbearably hot, which would lead to animal and people extinction;
 - b) the Earth would lose all of its liquid water supplies;
 - c) we could try to do the same with other planets to make them suitable for living.

d) Which of the words in bold means...

1. to go up?
2. to turn from ice and snow into water?
3. to be gradually taken in?
4. to cause a gas to leave an enclosed area and enter the surrounding area?
5. a substance which is used to provide heat or power, usually by being burnt?

6. to make smaller?
7. to allow a substance to go out?
8. becoming larger?

e) Use these word combinations to explain the term *climate change*.



The Sun's energy, be absorbed, trapped in the atmosphere, carbon dioxide, be released, burn fuel, emissions of gases, the greenhouse effect, temperature rise, glaciers melt, reduce biodiversity, extinction of species.

3. a)  Read the conditional sentences. Which of them tells us about: 1) real future; 2) unreal present; 3) unreal past?

1. If the world temperature rises too much, one of the most dramatic results of global warming will be that glaciers will melt, the sea level will rise and a lot of coastal regions will drown.

2. Some scientists say we wouldn't have damaged the environment so much if we hadn't started the Industrial Revolution in the 18th century.

3. If the climate changed enough, a lot of areas would become unbearably hot, which would lead to animal and people extinction.

b)  Match the sentences with the patterns below.



Conditional I = *If* + Present Simple / Continuous, *will* + Simple / Continuous Infinitive

Conditional II = *If* + Past Simple / Continuous, *would* + Simple / Continuous Infinitive

Conditional III = *If* + Past Perfect, *would* + Perfect Infinitive

c) Answer the questions.

1. What word do you always use in the main clause of the unreal conditional sentences?
2. What word do you always use in the conditional clause of the unreal conditional sentences?

3. Does the meaning of the sentence change if you change the order of the clauses?
4. Do you always put a comma between the clauses?
5. Which of the grammar structures tells us about lost opportunities?


4. Complete the sentences with the correct forms of the verbs to express lost opportunities.

1. If industries (not / increase) releasing greenhouse gases into the atmosphere, the greenhouse effect (not / start) to build up.
2. If humans (not / release) fewer CFCs into the atmosphere, the ozone layer (not / become) depleted.
3. If humans (not / cut down) so many trees for fuel, they (not / release) so much pollution into the air.
4. If humans (not / cut down) so many trees, the forests (absorb) more carbon dioxide by now.
5. If rain and snow (not / start) mixing with acids, the problem of the acid rain (not / appear).
6. Humans (not / make) such a great impact on the environment if they (not / produce) such an amount of greenhouse gases.

5. a) Work in pairs. Use the chain of events to speak about lost opportunities. Take turns.

Example: If humans haven't developed, they wouldn't have made progress.

Humans developed – humans made progress – they moved to cities – industries developed – cities grew in population – cities grew in size – people needed more electricity, cars and other products – industries grew – more fuels were burnt – more greenhouse gases were produced – more heat was accumulated in the atmosphere – the temperature of the Earth rose – humans damaged the Earth – humans became an endangered species.

b)  Individually, write down the chain of events, using Conditional III.

6.  Write a paragraph explaining the threats of climate change.