

Physics Cristina: Climate Change – 24.02.

Climate change

A) The problem

WHAT IS THE GREENHOUSE EFFECT?

Many **greenhouse gases**, e.g. carbon dioxide, methane and ozone, **exist**¹ naturally and are needed to **create**² the greenhouse effect that keeps the Earth warm enough to **support**³ human life. However, the use of **fossil fuels**, e.g. **oil**, natural gas and coal, has produced **excessive**⁴ amounts of greenhouse gases, and the **result**⁵ is **global warming**: an increase in the average temperature on Earth. Of the 15 warmest years **on record**⁶, 14 have **occurred**⁷ since 2000. The **effects**⁸ of **climate change** can already be seen in our everyday lives. Summers are getting hotter and winters are getting wetter, so **drought**⁹ and **floods**¹⁰ are becoming more common. With it, animal and plant life is **suffering**¹¹ - some species will disappear altogether - and certain illnesses, e.g. hay fever, asthma and skin cancer, are becoming more common. To stop global warming from **destroying**¹² our **environment**¹³, we must act now.

¹ Are real or present

² Make something happen or exist

³ Help (human life) to continue

⁴ More than you want or need

⁵ Something that happens because of something else

⁶ Has been written down or recorded

⁷ Happened (formal)

⁸ A change or result

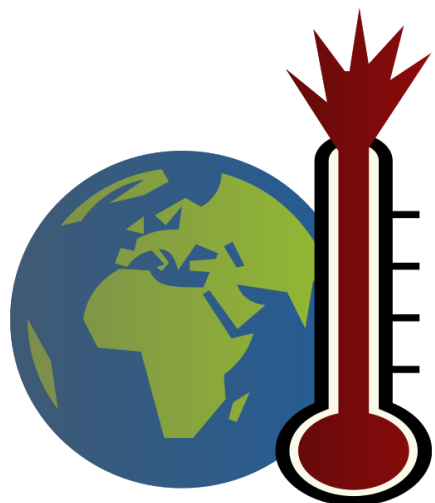
⁹ A long time without rain when people do not have enough water

¹⁰ When water covers an area that is usually dry, often from too much rain

¹¹ Experiencing something which is unpleasant

¹² Damaging something so badly that it does not exist or cannot be used

¹³ The air, land, and water around us



B) The **solution**¹⁴ (or, part of it)

To **reduce**¹⁵ global warming, the nations of the world will have to **act**¹⁶ together. In the meantime, individuals can also help.

SIX WAYS TO REDUCE GLOBAL WARMING:

- 1) Don't **throw** things **away** – **recycle** paper, glass, plastic, etc. so that it can be used again.
- 2) **Save**¹⁷ **energy**¹⁸ e.g. **switch off** lights when you leave a room.
- 3) Don't **waste**¹⁹ water, e.g. turn off the **tap** when you are brushing your teeth.
- 4) Change **light bulbs** for more **energy-efficient**²⁰ ones.
- 5) Drive less and walk more.
- 6) **Plant trees** because trees reduce the amount of carbon dioxide in the atmosphere, and so reduce greenhouse gases.

¹⁴ The answer to a problem

¹⁵ Make it less

¹⁶ Do something to solve a problem; synonym: **take action**

¹⁷ Don't waste

¹⁸ Gas and electricity

¹⁹ Use it badly

²⁰ Working well and not wasting energy



C) Exercises

1.1. How do you pronounce the underlined letters?

Use the index to help you.

1. Global - is it like go or got?
2. Flood - is it like foot or fun?
3. Fuel - is it like food or few?
4. Drought - is it like no or now?
5. Suffer - is it lie son or soon?
6. Climate - is it like educate or jackete?

1.2. Match the words on the left with the words on the right.

- | | | |
|-------------------|-------|------------|
| 1. the greenhouse | _____ | a. warming |
| 2. global | _____ | b. change |
| 3. fossil | _____ | c. effect |
| 4. greenhouse | _____ | d. fuels |
| 5. climate | _____ | e. Gases |

1.3. How can we help with global warming? (plant, throw away, tap, waste, take, reduce, save, turning, recycle)

- Don't _____ paper, glass, and plastic;
_____ them.
- Don't _____ water: turn off the _____
while you brush your teeth.
- _____ energy by _____ off the lights
when you leave a room.
- _____ trees in order to _____ the
amount of carbon dioxide.
- _____ action now, before it's too late.

1.4 Complete the explanations. (destroy, result, efficient, cause, environment, occurring, energy, exist, effects, drought, flood)

1. We don't have to create greenhouse gases; they _____ naturally.
2. Greenhouse gases in the atmosphere _____ the greenhouse effect.
3. Global warming is the _____ of an increase in the amount of greenhouse gases.
4. Two _____ of climate change have been hotter summers and wetter winters.
5. A _____ is often the result of too much rain.
6. A _____ is a long period without rain, and they are _____ more frequently now.
7. The _____ is the air, land, and water around us.
8. If you _____ something, it is so badly damaged, it cannot be used again.
9. If something is _____, it works well and doesn't waste energy.
10. _____ is the power that comes from gas, electricity, etc.

1.5 Complete the table.

Verb	Definitions
1.recycle	<i>a, To be real or present.</i>
2.waste	<i>b, To help or assist someone or something.</i>
3.destroy	<i>c, To damage something so badly that it can no longer be used or repaired.</i>
4.exist	<i>d, To use something carelessly, causing it to be lost or not used efficiently.</i>
5.save	<i>e, Not to waste.</i>
6.reduce	<i>f, To process used materials so they can be used again.</i>
7.support	<i>g, To experience pain, hardship, or distress.</i>
8.suffer	<i>h, To make something smaller or less in amount.</i>