

Key knowledge

- **Global warming** (also known as **climate change**) is the increase in the temperature of the Earth.
- In the past century, temperatures have risen by 1°C and they are rising quickly.
- Global warming is caused by **greenhouse gases**.
- Burning **fossil fuels**, such as coal, gas and oil, produces **carbon dioxide (CO²)**, which is a greenhouse gas. We often talk about CO² **emissions**, or carbon emissions, which means the carbon dioxide gas we make when we burn fossil fuels.
- These carbon emissions are also called carbon **pollution**. Carbon pollution is increasing global warming.
- Petrol is a fossil fuel because it is made from oil. Driving cars or using other transport that uses fossil fuels contributes to global warming.
- Some electricity is made by burning fossil fuels. Using more **renewable power** would reduce the impact on global warming.
- **Deforestation** is also a cause of global warming. Trees soak up carbon dioxide, so when people cut them down, more carbon dioxide stays in the air.
- Farming causes global warming, especially **cattle** farming. When cows burp and fart, they release a greenhouse gas called methane. In some places, especially in the Amazon Rainforest, people cut trees down for space for cattle to be farmed. **Fertilisers** and **pesticides** used on **crops** release greenhouse gases.
- Transporting food also produces carbon emissions as it burns fossil fuels.
- Global warming is harmful to the **environment**. It is melting the polar ice caps. The arctic **climate zone** is threatened. This means that habitats for animals such as polar bears are being destroyed. It also means that sea levels are rising and many areas that did not flood before will flood. As Earth's climate continues to warm, the intensity and amount of rainfall during storms such as **hurricanes** is expected to increase. **Droughts** and heat waves are also expected to become more intense as the climate warms.
- To reduce global warming, we need to travel using less fossil fuels, eat less meat and reduce, reuse and recycle. This will reduce carbon emissions. We all need to reduce our **carbon footprint**.
- Single use plastic is a huge environmental problem: it uses fossil fuels and it takes a long time to break down after use so causes long-lasting litter problems. This often damages animal habitats.
- Greta Thunberg is a Swedish student who has led a campaign to raise awareness of global warming.

Key vocabulary

the environment	The environment is everything around us. The air, soil, water, plants, and animals on Earth make it up.
global warming	Global warming is the increase in the temperature of the Earth. It is also called climate change .
the climate	The climate is long term weather patterns.
climate zone	A climate zone is a large area with a shared climate.
greenhouse gases	Greenhouse gases trap heat, acting like a blanket around the Earth that does not let heat escape out to Space.
carbon dioxide	Carbon dioxide (CO ² for short) is a greenhouse gas released when fossil fuels are burned.
fossil fuels	Fossil fuels come from coal, gas and oil. They come from very old life forms and come out of the ground.
CO ² or carbon emissions	CO ² emissions means the amount of carbon dioxide gas produced when fossil fuels are burnt.
pollution	Pollution is when harmful gases, smoke and chemicals get into the environment.
renewable power	Renewable power is electricity that comes from renewable sources like the sun and water.
deforestation	Deforestation is when humans cut down lots of trees.
cattle	Cattle is the word for cows on a farm.
crops	Crops are plants grown and harvested by farmers.
fertiliser	Fertilisers are chemicals added to soil to help things grow.
pesticides	Pesticides are chemicals added to crops to kill insects and other pests that eat or damage crops.
a hurricane	A hurricane is a big storm with strong winds..
a drought	A drought is when there is very little rain for a long time.
polar ice caps	The polar ice caps are the large areas of ice at the North and South Poles.
a habitat	A Habitat is the word for the place where an animal lives.
carbon footprint	Your carbon footprint is the amount of carbon dioxide released into the air because of your needs. Eg, food, travel, clothing.
a campaign	A campaign is a series of activities to produce a result.

Knowledge and skills

Location and place knowledge

Locate the world's countries, using maps to focus, concentrating on key physical characteristics

Human and physical geography

Describe and understand key aspects of physical geography,

Geographical skills and fieldwork

Use world maps, atlases globes and digital/computer mapping to locate countries and describe features studied

Bridge back



Why don't meerkats live with penguins? Y1

Bridge forward



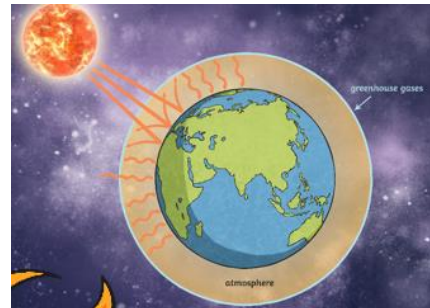
Why is the Amazon so important? Y4

Key images

Causes of global warming



Farming and burning fossil fuels make greenhouse gases.



Greenhouse gases act as a blanket around Earth.

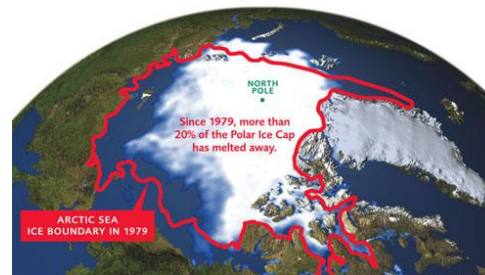


Deforestation means chopping down large areas of trees which means there are not enough trees to absorb carbon emissions.

Effects of global warming



Extreme weather events like floods, hurricanes and droughts are effects of global warming.



Since 1979, more than one fifth of the Polar Ice Cap has melted away. This is making sea levels rise and destroys habitats.



Polar bears need the ice to live and hunt on.

What we can do to stop global warming



Travel less! Walk, cycle or use public transport!



Use less electricity. Campaign for renewable energy.



Eat less meat and buy local food that hasn't been transported long distances.