What do you know about the greenhouse effect?

This task is about the greenhouse effect on the Earth. The Greenhouse Effect Some of the reflected heat passes through the atmosphere, Some of the sun's rays are and some is absorbed and reflected by the Earth reflected again in all directions and the atmosphere. by greenhouse gas molecules. The effect of this is to warm the Earth's surface and lower the atmosphere. Heat from the Sun passes through the **A**TMOSPHERE clear atmosphere. EARTH Some heat is emitted from the Most heat is absorbed by the Earth's surface Earth's surface. and warms it.

- a) What is the main part that "greenhouse gases" play in keeping the earth warm? (Select one)
 - O They stop too much heat coming in from the sun.
 - They let heat from the sun through to warm the earth.
 - O They make heat energy.
- They absorb reflected heat that would otherwise head back out into space.
- b) Which of these greenhouse gases has the biggest warming effect?

o carbon dioxide	O ozone	o carbon monoxide	O CFCs
Methane	O Sulphur dioxide	Nitrogen oxide	O Water vapour

Explain your answer.

c) Which of the following changes could happen if the greenhouse effect gets bigger?

Only select "yes" or "no" if you are certain you are right.

If you are not sure, choose the "don't know" option, so the class can discuss this idea later.

Possible enhanced greenhouse effect

- 1. New Zealand will be sunnier overall Yes/No/Don't know
- 2. New Zealand will have less rain overall Yes/No/Don't know
- 3. More people will get skin cancer Yes/No/Don't know
- 4. The air will get dirtier Yes/ No/ Don't know
- 5. Sea levels will rise around our coast Yes/No/Don't know
- 6. Violent storms will happen more often Yes/No/Don't know
- 7. Winters will get colder in New Zealand Yes/No/Don't know
- 8. Our glaciers will shrink Yes/No/Don't know

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