

Separate Science - Chemistry - Key Stage 4

C10 Using Resources

# **Glass, ceramics and composites**

Miss Offer



# Independent task - Recall questions

## Answer the following questions:

1. What are the raw materials used to make soda-lime glass?
2. Give 3 properties of soda-lime glass
3. How are the particles arranged in soda-lime glass?
4. What are the raw materials used to make borosilicate glass?
5. Why is ovenware made out of borosilicate glass instead of soda-lime glass?



# Independent task - Recall questions

## Answer the following questions:

1. What is a composite?
2. Give 3 examples of composite materials.
3. How are ceramics made?
4. Give 3 examples of clay ceramic products.
5. What are 3 properties of clay ceramics?



# Independent task - Comparing different materials

	Aluminium	Steel	Timber
<b>Density</b>	3g/cm <sup>3</sup>	8g/cm <sup>3</sup>	0.5g/cm <sup>3</sup>
<b>Relative compressive and tensile strength</b>	25	10	2
<b>Moisture resistance</b>	Good	Rusts unless protected	Absorbs water unless protected

1. Compare the densities of the 3 materials.
2. Explain why aluminium is used in window frames instead of timber.
3. Explain why aluminium is a better choice in aeroplanes than steel.

