

Larger version cards

**Chemical reactions are used  
to make new materials**

**Chemical reactions are important  
in biological systems**



**Chemical reactions can be used  
as energy sources**

Plants use energy from the sun to convert water and carbon dioxide into glucose and oxygen.  
This process is known as photosynthesis

haemoglobin + oxygen → oxyhaemoglobin

To make a moulded item out of polyurethane, the two liquid components (polyisocyanate and polyol) are mixed together in exactly the right masses.  
The exothermic reaction takes a minute.



$n$ (ethene) → polyethene



1,2-diaminohexane + hexanedioic acid → nylon-6,6

octane + oxygen → carbon dioxide + water

