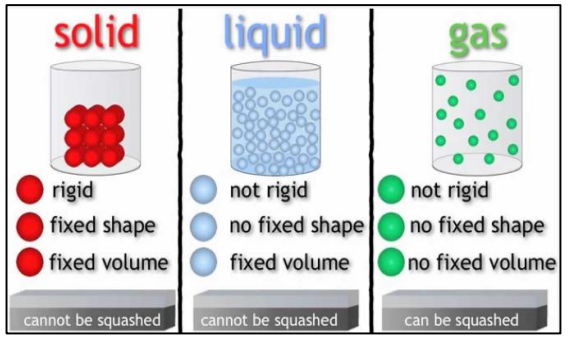
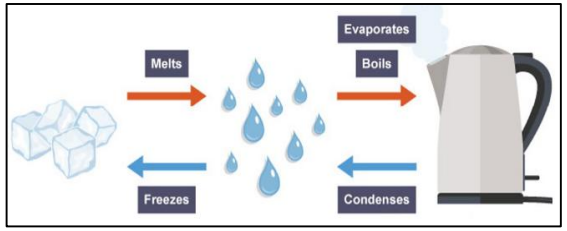
States of Matter

Year 4

Solids, liquid and gas



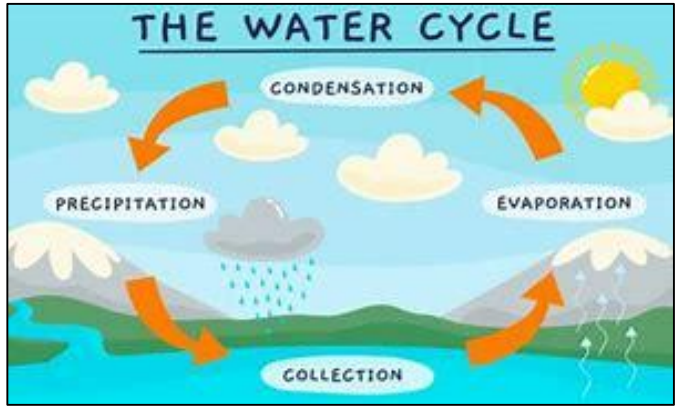
Change of state



Key 3

- Compare and group materials together, according to whether they are solids, liquids or gases.
- Observe that some materials change state when they are heated or cooled, and measure or research the temperature at which this happens in degrees Celsius (°C).
- Identify the part played by evaporation and condensation in the water cycle and associate the rate of evaporation with temperature.

The water cycle



Key Vocabulary

Solid	A solid substance or object stays the same shape whether it is in a container or not.
Liquid	A substance which is not solid but which flows and can be poured, for example water.
Gas	A substance like air that is neither liquid nor solid and burns easily. It is used as a fuel for cooking and heating.
Heating	Raising the temperature of something.
Cooling	Reducing the temperature of something.
State change	A physical change in matter.
Melting	The action of changing from a solid to a liquid as the temperature is raised.

Freezing	Water changing to a solid at 0 degrees.
Melting point	The temperature at which a solid will melt.
Boiling	The point in which a liquid is heating until it becomes a gas.
Boiling point	The temperature at which a liquid boils and turns to vapour.
Evaporation	The process of turning liquid into vapour.
Condensation	The process of changing from a gas to a liquid or solid state.
Temperature	The degree of heat.
Water cycle	The continuous movement and interchange of water between its three phases (solid, liquid, and gas) in the Earth's atmosphere.