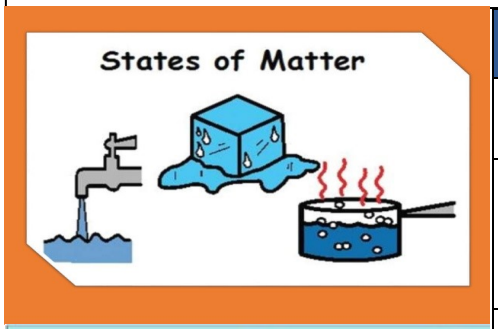
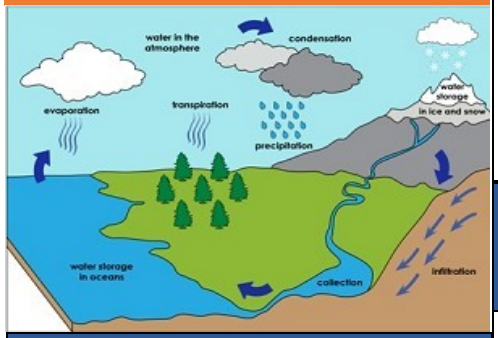
Happy Children, Happy School,
Learning Together, Growing Together

Y4 Sorcerer's Apprentice

(states of matter)





How you can help at home:

- Discuss how solids, liquids and gases can change state.
- Discuss how some familiar materials can exist in different states, e.g. water.

End Points:

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.

Prior Learning	Future Learning
Recognising similarities and differences between different materials (wood/plastic/metal) Exploring the structure of the earth. Identifying and observing properties of rock and testing these properties.	Dissolving and recovering substances from a solution. Separating solutions. Recognising irreversible (chemical) changes.

Key Vocabulary

Word	Definition
solid	Particles are close together, are arranged in a regular way, can vibrate but cannot move and cannot be compressed.
liquid	Liquid particles are close together, are arranged in a random way, move around each other, take on the shape of the container and cannot be compressed.
gas	Gas particles are arranged in a random way, are far apart and move quickly in all directions.
changing state	When a substance changes between a solid, liquid or gas.
melt	When solid changes to liquid because of temperature change.
freeze	When liquid changes to solid because of temperature change.
particles	Everything is made up of tiny particles joined together.
evaporation	When a liquid changes state into a gas.
condensation	When a gas changes state into a liquid.
precipitation	Rain, sleet, hail, snow or rime ice that falls from a cloud.

Primary Ecclesall School Key Concepts

Effective Communicators

Creative thinkers & problem solvers

The ability to make **connections** and **comparisons**

Valuable members of a **community**

Understanding **change**, capable of changing and accepting change

Respect Positivity Kindness