

Topic: The Water Cycle

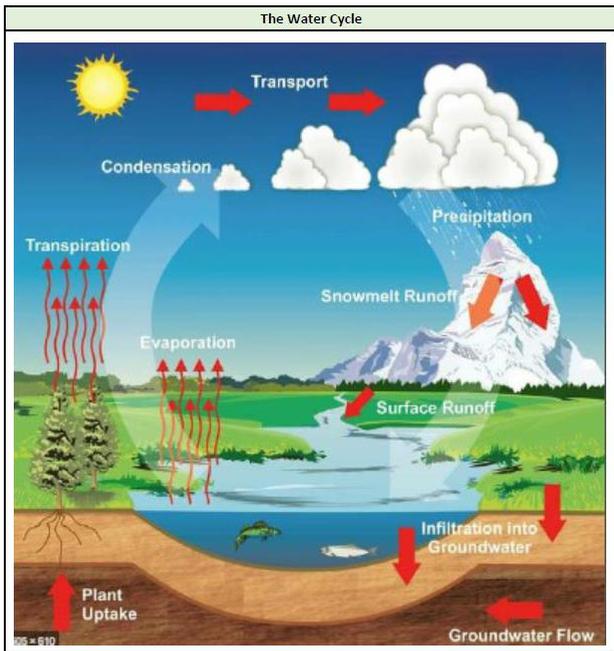
Strand: Human and Physical Geography

What should I already know?

Evaporation happens when water (a **liquid**) turns into water vapour (a **gas**) when it is heated.
Condensation happens when water vapour (a **gas**) turns into small water droplets (**liquid**) when it is cooled.
Note: The above will be taught alongside this unit of work
 Plants **absorb** water through the soil to help them grow.

How does the water cycle work?

Evaporation:
 The Sun causes the water from the Earth to **evaporate**.
 This water **evaporates** from seas, lakes, streams and even puddles.
 When it **evaporates**, water turns into **water vapour**.
Condensation:
 As the **water vapour** rises, it cools down. As it cools down, **condensation** happens and **water vapour condenses** to small droplets of water.
 Clouds are made from a mix of dry air and small droplets of water.
Precipitation:
 As **condensation** continues to happen, more droplets of **water vapour** are formed. When the droplets become heavy and large enough, they fall back to the Earth's surface in the form of rain or snow.
Runoff and Transpiration:
 As **precipitation** happens in the form of rain or snow falling back to Earth, water is **absorbed** into the soil.
 This water is used by plants to grow - when water from plant leaves **evaporates** back into the **atmosphere**, this is called **transpiration**.
 Water may also run off and enter oceans, seas and rivers.
 Water then **evaporates** again and the water cycle begins again!



Vocabulary

absorb	soak up or take in
atmosphere	the layer of air or other gases around a planet
condensation	small drops of water which form when water vapour or steam touches a cold surface , such as a window
evaporation	to turn from liquid into gas; pass away in the form of vapour
gas	a form of matter that is neither liquid nor solid. A gas rapidly spreads out when it is warmed and contracts when it is cooled.
groundwater	water that is found under the ground. Groundwater has usually passed down through the soil and become trapped by rocks.
liquid	in a form that flows easily and is neither a solid nor a gas.
precipitation	rain, snow, sleet, dew, etc, formed by condensation of water vapour in the atmosphere
runoff	rain in excess of the amount absorbed by the ground
surface	the flat top part of something or the outside of it
transpiration	evaporation of water from a plant's leaves, stem, or flowers
water vapour	water in the gaseous state, esp when due to evaporation at a temperature below the boiling point

Geographical Skills and Fieldwork

- Present what you know about the water cycle using a variety of skills using appropriate vocabulary.
- Observe **evaporation** and **condensation** in action by using bowls of water and mirrors /glass.