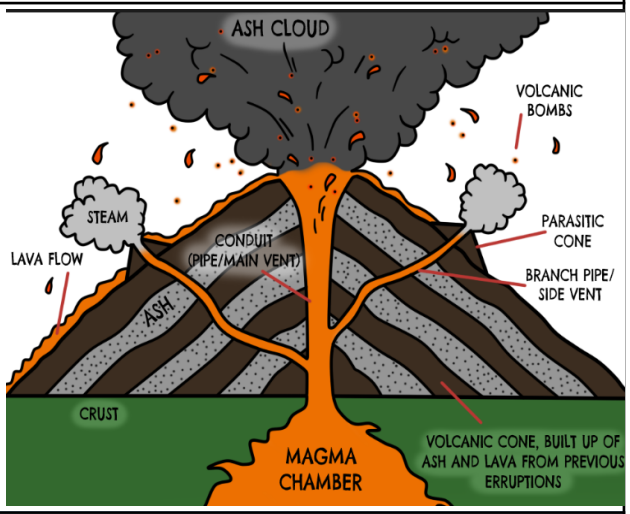
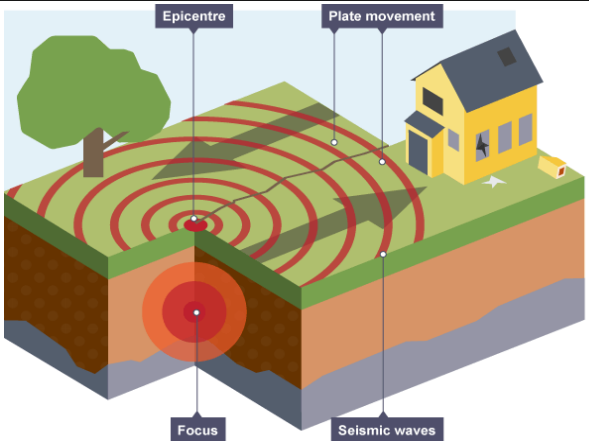
Key questions:

- How are volcanoes and earthquakes formed? Is there a pattern to where volcanoes/earthquakes are located? What impacts on this? How do volcanoes and earthquakes impact on the physical and human environment?

Key knowledge:

- The earth is made of layers: the **crust**, the **mantle** and the **core**.
- The **mantle** is made of molten rock- **magma**.
- Magma rises through weaknesses in the Earth's crust.
- Pressure builds which is released as an **eruption**.
- 90% of volcanoes are located in the **Pacific 'Ring of Fire'**- **oceanic crust** is forced under **continental crust**.
- Three stages of volcanoes: active, dormant and extinct.
- Subduction- tectonic plate is forced under a plate creating pressure



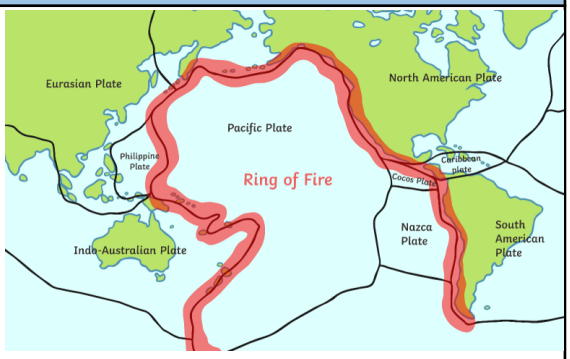


Key knowledge:

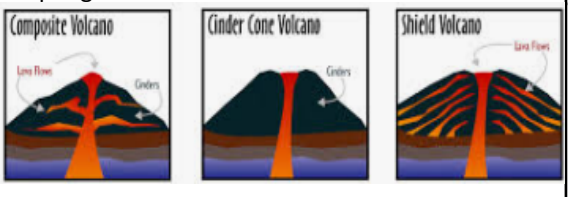
- 75% of earthquakes occur in the **Pacific 'Ring of Fire'**.
- The Earth's **crust** is broken up into **tectonic plates**.
- These plates are constantly moving.
- Earthquakes occur at **plate boundaries** when the plates collide or rub against each other.
- Tension/ pressure builds up at these boundaries- when the plates lurch and move, **seismic waves** are sent out.
- **Volcanic ash** creates **rich, fertile soil** which is good for farming- lots of people still live in these regions.

Key vocabulary:

Crust- the thin outer layer of rock on the Earth's surface.
Mantle- the layer below the crust, made of molten rock
Magma- molten rock in the mantle- lava when it erupts.
Eruption- process of magma/lava exiting the volcano
Core- the solid centre of the Earth that is made of metals: nickel and iron
Tectonic plate- the Earth's crust is divided up into plates. These plates are constantly moving.
Epicentre- location of most pressure during an earthquake
Seismograph- instrument that measures shock waves
Fault line- the place where two plates meet each other.
Tsunami- a huge wave caused when an earthquake occurs at sea.
Fertile soil- rich in vitamins, nutrients and minerals- ash from volcano creates fertile soil.
Famous volcanoes: Mount St Helens, Krakatoa, Vesuivius



Location of most of the world's volcanoes and earthquakes. Types:
Dormant (sleeping)- hasn't erupted for a long time, but may still
Active volcano- still erupting regularly
Extinct volcano- is a dead volcano and will not erupt again



Output:

- Information text all about volcanoes and earthquakes
- Newspaper report on the destruction of pompeii