

Key Vocabulary

Still - no movement.

Force - A push or pull on an object which can cause it to move, change speed, direction or shape. Measured in Newtons (N).

Acceleration - getting faster.

Deceleration - getting slower.

Magnet - A material or object that produces a magnetic field. It attracts or repels magnetic objects, including iron.

Speed - how far something travels in a set amount of time (mph).

Velocity - describes speed and direction (a cyclist going 3mps in a northerly direction).

Thrust - increases velocity.

Drag - decreases velocity.

Nuclear - relating to the nucleus of an atom.

Attract - To pull towards. Opposite of repel.

Repel - To push away. Opposite of attract.

Friction - The resistance of motion when one object rubs against another. Friction causes objects to slow down and the energy becomes heat.

Gravity - The area around a large object when a weight can be felt. The sun's gravity keeps the planets orbiting around it.

Mass - The amount of matter contained in an object. Measured in units such as g, kg.

Key Questions

- What affects the strength of a magnet?
- What everyday objects use magnets?
- How does a compass work?
- Why isn't plastic magnetic?
- How many different types of magnet is there?

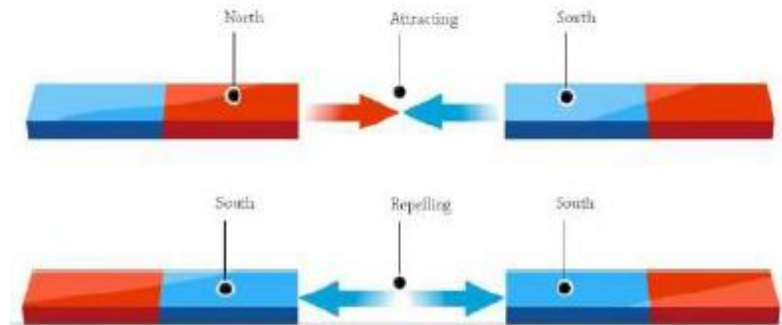


Bar Magnet

Horseshoe Magnet

Disc Magnet

Magnets have north and south poles. These attract each other but two north or two south poles repel each other.



Why don't we fall off the Earth?



FORCES AND MAGNETS

Newton's Three Laws of Motion

First law	An object will continue in the state it is in (rest or motion) unless a force acts on it.
Second law	Acceleration depends on the magnitude of the force applied and the mass of the object.
Third law	"For every action, there is an equal and opposite re-action."