

Bomere and the XI Towns Federation Knowledge Organiser—Science

Topic: Science— Magnets and Forces

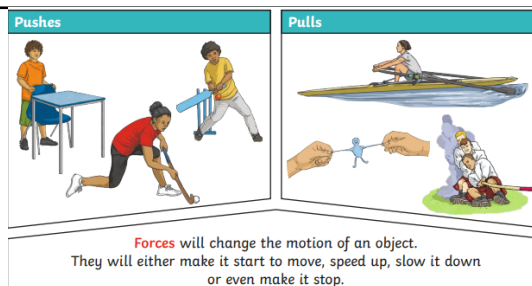
Class/Year Groups: Year 3

Term: Spring

What you already know?

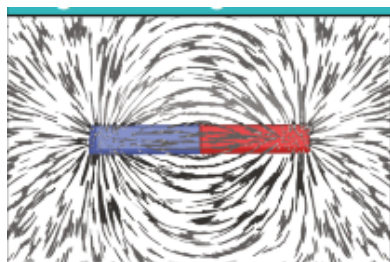
Pupils may have played with magnets before but have not learned about magnets.

What you will learn:



Key vocabulary:

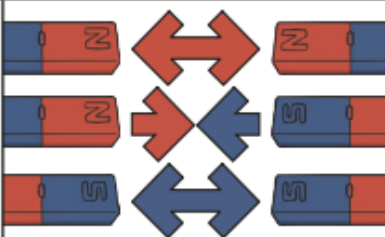
Magnet	An object that produces a magnetic force.
Magnetic	Objects that are attracted towards a Magnet are magnetic. Iron, Nickel and Cobalt are magnetic metals.
Magnetic Fields	The area around the magnet where there is a magnetic force which will pull magnetic objects towards the magnet.
Poles	North and South Poles are found at different ends of a magnet.
Repel	Repulsion is a force that pushes a magnet away.
Attract	Attraction is a force that pulls objects together.
Forces	Pushes or pulls.



Like **poles** **repel**.
Opposite **poles** **attract**.



A **magnetic field** is invisible. You can see the **magnetic field** here though. This is what happens when iron filings are placed on top of a piece of paper with a **magnet** underneath.



The needle in a compass is a **magnet**. A compass always points north-south on Earth.

National Curriculum Objectives:

- compare how things move on different surfaces
- notice that some forces need contact between two objects, but magnetic forces can act at a distance
- observe how magnets attract or repel each other and attract some materials and not others
- compare and group together a variety of everyday materials on the basis of whether they are attracted to a magnet, and identify some magnetic materials
- describe magnets as having two poles

