

## Prior Learning

- I can compare how things move on different surfaces.
- I know that some forces need contact between two objects, but magnetic forces can act at a distance.
- I can observe how magnets attract or repel each other and attract some materials and not others.
- I can compare and group a variety of everyday materials on the whether they are magnetic or not.
- I can identify some magnetic materials through my exploration.
- I know that magnets have two poles.
- I can predict whether two magnets will attract or repel each other, depending on which poles are facing.

## Sticky Knowledge

- I know that unsupported objects fall towards the Earth because of the force of gravity acting between the Earth and the falling object.
- I can identify the effects of air resistance, water resistance and friction, that act between moving surfaces.
- I know that some mechanisms, including levers, pulleys and gears, allow a smaller force to have a greater effect.

## Vocabulary

<b>Accelerate / Acceleration</b>	When the speed of an object increases as forces act on it.
<b>Air Resistance</b>	A force caused by air with the force acting in the opposite direction to direction to an object that is moving through the air. This is
<b>Decelerate / Deceleration</b>	When the speed of an object decreases as forces act on it.
<b>Force</b>	A push or pull upon an object, measured in Newtons (N).
<b>Friction</b>	The resistance that a surface or object puts on another object that is touching it as it moves.
<b>Gravity</b>	The force that attracts objects towards the
<b>Lever</b>	A bar resting on a pivot that is used to move an object. Can be used to increase the
<b>Mass</b>	The measure of the amount of matter in an
<b>Pull Force</b>	To draw or haul towards oneself or itself, in a
<b>Pulleys</b>	A wheel with a grooved rim around that changes the direction of a force applied to the
<b>Push Force</b>	To move something by exerting force on it.
<b>Water Resistance</b>	A force that is caused by water with the force acting in the opposite direction to an object moving through the water. This is sometimes
<b>Weight</b>	The force of gravity that acts on an object. This gets bigger as the mass of an object is

### Balanced Force



### Unbalanced Force

