Electricity

Overview of unit / topic

In this unit we will be investigating electricity. We will consider which common appliances use electricity. We will then identify electrical conductors and electrical insulators. We will investigate how electrical circuits work and what would prevent them from working.

Key Questions

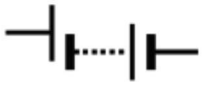
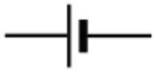
What is electricity?
Why is electricity important?
What do we use electricity for?
How do we generate electricity?
What is a conductor?
What is an insulator?
What will make a bulb brighter?
What will make a bulb dimmer?

Key Vocabulary

Electricity	A flow of charged particles. An important form of energy which powers things around us.
circuit	A path that an electrical current can flow around.
Symbol	A visual picture that stands for something else.
Battery/cell	A device that stores chemical energy until it is needed. A cell is a single unit. A battery is a collection of cells.
Current	The flow of electrons, measure in amps.
Amps	How electric current is measured.
Voltage	The force that makes the electric current move through the wires. The greater the voltage, the more current will flow.
Resistance	The difficulty the electric current has when flowing around a circuit.
Electrons	Very small particles that travel around an electrical circuit.

Key Knowledge and Understanding: What will we be learning about in this unit / topic?

To identify common appliances that run on electricity.
Construct a simple circuit containing a cells, wires, bulbs, switches and buzzers.
To identify if a lamp will light in a simple circuit.
To recognise that a switch opens and closes a circuit.
To recognises some common conductors and insulators.
To associate metals with being good conductor.

 battery	 closed switch	 open switch	 cell	 voltmeter
 buzzer	 lamp	 lamp	 motor	wire