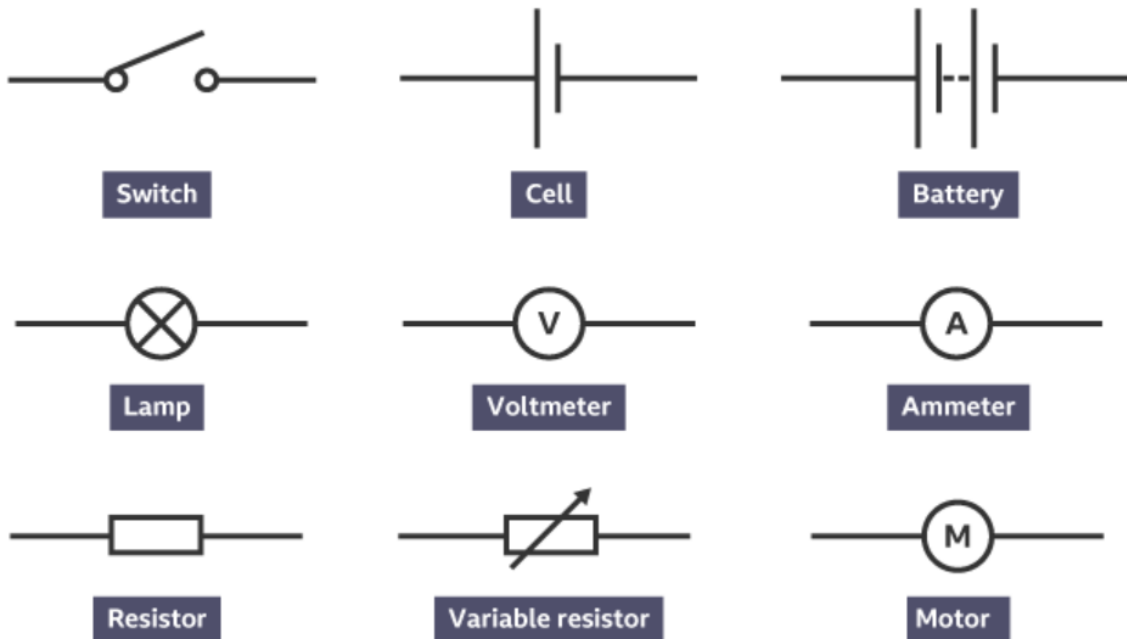


Year 9: Electricity

Current

- When you complete an electric circuit charged particles or charges move in the wires the **current** is the amount of charges flowing per second.
- The equation to work out current in a circuit is the charge/time.
- A circuit must be complete for current to flow.
- The current in a circuit can be measured using a device called an ammeter which is put into the circuit.

Circuit Symbols



Safety and Circuits

- Electricity can be dangerous if care is not taken when using it.
- Damaged electrical items must not be used as exposed wires can cause electrocution.
- Electrical items should not be used near water as water conducts electricity and could shock you.

Potential Difference

- A voltmeter is a device used to measure the potential difference in a circuit.
- The unit of measurement for potential difference is voltage or volts and the symbol is V.
- Voltage (potential difference) can be calculated using the following equation: Current X Resistance.
- Voltmeters must be placed in parallel with the components

Series Circuits

Current in a series circuit is the same everywhere and potential difference is shared between components.

