

Magnetic & Electrical Energy Learning Goals

Goal #	Learning Goal & Targets	Goal	Quiz	Test
1	<p>Static Electricity I can describe the interactions of like and unlike charges.</p> <ul style="list-style-type: none"> ★ This means I can describe the interactions of charges in static electricity. ★ This means that I can describe how charges build-up and discharge in static electricity 			
2	<p>Current Electricity and Circuits I can explain how a circuit works.</p> <ul style="list-style-type: none"> ★ This means I understand how conductors and insulators are used in a circuit. ★ This means I can draw a circuit and label the source, means of transfer, and resistance. ★ This means I can explain the difference between an open and closed circuit. ★ This means I can explain how a switch works in a circuit. 			
3	<p>Circuits I can describe the effects of resistance, amount of voltage, and kind of transfer materials on the current being transferred through a circuit.</p> <ul style="list-style-type: none"> ★ This means that I can explain how resistance can make a filament glow. ★ This means that I can explain how the kind and amount of transfer materials (wires) can affect resistance and energy output in a circuit. ★ This means that I can make predictions about how the number of sources (batteries) will affect the energy output in a circuit. 			
4	<p>Series and Parallel Circuits I can explain the difference between series and parallel circuits.</p> <ul style="list-style-type: none"> ★ This means I can diagram and distinguish between complete series and parallel circuits. ★ This means I can identify advantages and disadvantages of series and parallel circuits. 			
5	<p>Energy Transformations I can observe and describe the evidence of energy transformations in a closed circuit.</p> <ul style="list-style-type: none"> ★ This means that I can identify the energy transformations that take place in a closed circuit. ★ This means that I can describe how the chemical energy in a battery is transformed into electrical energy in the wires and converted to heat/light energy in a bulb. ★ This means that I can explain the advantages and disadvantages of incandescent, LED, and CFL bulbs. 			
6	<p>Magnetism I can describe how magnetism works.</p> <ul style="list-style-type: none"> ★ This means that I can describe the interactions of charges in magnetism. ★ This means that I can describe magnetic field lines and how they work in the Earth. ★ This means that I can explain how magnets are used in simple motors and other practical uses. 			