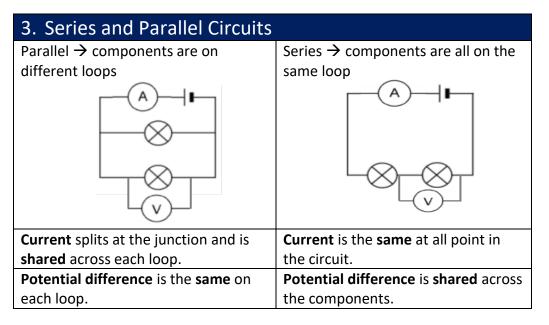


Science: Electricity part 1

	Key word	Definition		
1	Cell	Generates electricity for the circuit.		
2	Battery	More than one cell in series.		
3	Voltmeter	Used to measure potential difference in volts, connected in parallel.		
4	Ammeter	Used to measure current in amps, connected in series.		
5	Fixed resistor	A component that slows the current in the circuit by a fixed amount.		
6	Variable resistor	A resistor where the resistance in can be changed.		
7	Diode	Resistor that has a high resistance in the negative direction around the circuit, but a low resistance in the positive.		
8	Light emitting diode (LED)	Resistor that emits light when a current flow through it.		
9	Light dependent resistor (LDR)	Resistor that is sensitive to light.		
10	Thermistor	Resistor that is sensitive to temperature.		
11	Filament bulb	Emits light when a current flows through it.		
	1 2 <u>+</u>			
	3 —(v— ⁷ ———————————————————————————————————		
	4 —	A 8 8		

2. Electricity Equations				
Equation	Symbol Equation	Symbols and units		
Charge = current x time	Q = It	Q = Charge (Coulombs – C) I = Current (Amps – A) t = time (seconds – s)		
Potential difference = current x resistance	V = IR	V = potential difference (Volts – V) I = Current (Amps – A) R = Resistance (Ohms – Ω)		
Power = current ² x resistance	$P = I^2R$	P = Power (Watts – W) I = Current (Amps – A) R = Resistance (Ohms – Ω)		
Power = current x potential difference	P = IV	P = Power (Watts – W) I = Current (Amps – A) V = potential difference (Volts – V)		
Energy transferred = charge x potential difference	E = QV	E = Energy (Joules – J) Q = Charge (Coulombs – C) V = potential difference (Volts – V)		



Science: Electricity part 1

