## **Science - Physics**



## **Key Stage 4 - Year 10 - Combined Science**

Term One	Term Two	Term Three
Waves	Electricity	Forces
<ul> <li>Electromagnetic spectrum</li> <li>Radiation</li> <li>Absorption</li> </ul>	<ul> <li>I - V Characteristics</li> <li>LED</li> <li>Diode</li> <li>LDR</li> <li>Filament lamp</li> <li>Ohmic conductors</li> <li>Energy</li> <li>Voltage</li> <li>Charge</li> <li>Household electricity</li> <li>Power</li> </ul>	<ul> <li>Speed</li> <li>Velocity</li> <li>Graphs</li> <li>Acceleration</li> <li>Equations of uniform acceleration</li> </ul>
Energy	Working Scientifically	
<ul> <li>Changes in Energy (EP, EK and Conservation of Energy)</li> </ul>	Working scientifically	
Electricity	Forces	
<ul> <li>Currents and voltages in series and parallel</li> <li>Voltage</li> <li>Current</li> <li>Resistance</li> <li>Charge</li> <li>Investigating resistance</li> </ul>	<ul> <li>Scalars</li> <li>Vectors</li> <li>Resultant forces</li> <li>Components of a vector</li> <li>Work done</li> <li>Hooke's law</li> </ul>	





## **Key Stage 4 - Year 11 - Combined Science**

Term One	Term Two	Term Three
Forces	Magnesium and Electromagnetism	Exams
<ul> <li>Newton's laws</li> <li>Inertia</li> <li>Terminal velocity</li> <li>Gravity</li> <li>Stopping distances</li> <li>Momentum</li> </ul>	Motor effect	Revision and exams
Magnesium and Electromagnetism	Atomic Structure	
<ul><li>Magnetic fields</li><li>Electromagnets</li></ul>	<ul> <li>Structure of the atom</li> <li>Isotopes</li> <li>Development of the model of the atom</li> <li>3 types of radiation</li> <li>Nuclear equations</li> <li>Half-life</li> </ul>	