



By following the AQA GCSE science qualifications, we are building on the hard work our students have completed during their key stage 3 studies. Students follow either AQA Combined Science: Trilogy or AQA Separate Sciences. This allows us to ensure the students follow the best path for them.

	Foci	Assessment	Knowledge Organiser
Unit 1 (Year 9)	<p>Energy (AQA Unit P1) The role of energy in the universe and the transfer of energy within and between different stores</p> <ul style="list-style-type: none"> • Types of energy stores • Conservation of energy • Transfer of thermal energy • Power • Efficiency • Power generation types 	<ul style="list-style-type: none"> • Continuous assessment via knowledge recall • Required practical – The effectiveness of different Thermal Insulators • End of unit test via past paper examination questions 	
Unit 2 (Year 10)	<p>Particle Model of Matter (AQA Unit P3) The standard particle model of matter and its role in phenomena such as changes of state and pressure</p> <ul style="list-style-type: none"> • Particle model • Density • Specific heat capacity • Specific latent heat • Pressure 	<ul style="list-style-type: none"> • Continuous assessment via knowledge recall • Required practical – Measurement of density • End of unit test via past paper examination questions 	
Unit 3 (Year 10)	<p>Electricity (AQA Unit P2) Energy transfer via electric circuits, electric circuit design and electricity in the home</p> <ul style="list-style-type: none"> • Electric charge • Direct current • Potential difference • Resistance • Component characteristics • Alternating current • National Grid • Electrical power 	<ul style="list-style-type: none"> • Continuous assessment via knowledge recall • Required practical – Resistance of a wire • Required practical – Component characteristics • End of unit test via past paper examination questions 	



Unit 4 (Year 10)	<p>Radiation (AQA Unit P4) The structure of the atom and how isotopes cause unstable nuclei and hence ionising radiation. The advantages and risks of nuclear power in the modern world.</p> <ul style="list-style-type: none">• Structure of the atom• Isotopes• Alpha, beta and Gamma radiation• Nuclear equations and half life• Radiation dose• Uses of radiation• Nuclear fission and fusion	<ul style="list-style-type: none">• Continuous assessment via knowledge recall• End of unit test via past paper examination questions	
Unit 5 (Year 10)	<p>Space (AQA Unit P8, Triple Only) The origins of the universe, from the big bang, through the formation of stars and galaxies, planets and onwards to the fate of the universe</p> <ul style="list-style-type: none">• Our solar system• Life cycle of a star• Orbital motion• Red shift• Big bang theory	<ul style="list-style-type: none">• Continuous assessment via knowledge recall• End of unit test via past paper examination questions	
Unit 6 (Year 10)	<p>Waves (AQA Unit P6) Waves as a form of energy transfer. Mechanical and electromagnetic waves and their importance in the world.</p> <ul style="list-style-type: none">• Transverse and longitudinal waves• Frequency, period and wavelength• Reflection and refraction• Electromagnetic waves• Ionising Waves	<ul style="list-style-type: none">• Continuous assessment via knowledge recall• Required practical – Measurement of wave parameters• Required practical – Reflection and refraction• Required practical – Absorption of infrared radiation• End of unit test via past paper examination questions	



Unit 7 (Year 11)	Forces Part 1 (AQA Unit P5) A consideration of forces on static objects. Displacement, velocity and acceleration of objects in motion. <ul style="list-style-type: none">• Scalars and vectors• Contact and non-contact forces• Resultant forces• Resolution of forces• Moments• Centre of mass• Graphs of displacement, velocity• Acceleration	<ul style="list-style-type: none">• Continuous assessment via knowledge recall• End of unit test via past paper examination questions	
Unit 8 (Year 11)	Forces Part 2 (AQA Unit P5) A consideration of forces on objects in motion. Pressure in solids, liquids and gasses. <ul style="list-style-type: none">• Force and acceleration• Weight and terminal velocity• Momentum• Forces and braking• Impact forces• Forces and elasticity• Pressure in solids, liquids and gasses (Triple only)	<ul style="list-style-type: none">• Continuous assessment via knowledge recall• Required practical – force and acceleration• End of unit test via past paper examination questions	
Unit 9 (Year 11)	Magnetism and Electromagnetism (AQA Unit P7) Magnetism, electromagnetic induction and the motor effect. <ul style="list-style-type: none">• Magnetism• Electromagnetism• The motor effect Triple only: <ul style="list-style-type: none">• Uses of electromagnets• Electromagnetic induction• Transformers and the National Grid	<ul style="list-style-type: none">• Continuous assessment via knowledge recall• End of unit test via past paper examination questions	