

**Year 13 Mock Examinations**  
**Monday 20<sup>th</sup> October 2025 – Wednesday 12<sup>th</sup> November 2025**

Subject	Summary of Exam (Type/length)	Topic content
Art	All day	Personal response (large scale) to self-selected theme
Biology	45 marks (10 MCQs, 35 structured answers)  60 minutes	<b>Module 2</b> Foundations in biology  <b>Module 4</b> Biodiversity, evolution and disease
Business	75 marks  90 minutes  (multiple choice, calculations, 9-mark questions, 25-mark essay)	Questions cover a range of topics from across the course so far, relevant knowledge from any unit could support written responses. Recommendation is to focus on the following topics during revision: <ul style="list-style-type: none"> <li>• What is business/ leadership: Types of ownership, decision trees, stakeholders, market capitalisation</li> <li>• Finance: Profit, break-even</li> <li>• Operations: Capacity utilisation, unit costs, quality, inventory management</li> <li>• HR: Financial and non-financial rewards, theories of motivation, productivity, labour turnover</li> <li>• Marketing: Price elasticity, niche and mass markets, Boston matrix</li> <li>• Strategy: SWOT, inflation, financial ratios</li> </ul>
Business (OCR)	No mock due to continuous assessment	
Chemistry	80 marks  (combination of MCQs and structured answers)  90 minutes	<ul style="list-style-type: none"> <li>• Topic 2: Bonding and Structure</li> <li>• Topic 5: Formulae, Equations and Amounts of Substance</li> <li>• Topic 6: Organic Chemistry I</li> <li>• Topic 7: Modern Analytical Techniques I</li> <li>• Topic 8: Energetics I</li> <li>• Topic 9: Kinetics I</li> <li>• Topic 10: Equilibrium I</li> </ul>
Computer Science	90 marks  90 minutes	<ul style="list-style-type: none"> <li>• Floating Binary</li> <li>• Database</li> <li>• Object Oriented Programming</li> <li>• Memory management and CUP Scheduling</li> <li>• Little man computer</li> <li>• Data structure</li> <li>• Search and Sorting Algorithm</li> <li>• Big O notation</li> <li>• Writing algorithms</li> <li>• Computational thinking</li> <li>• Graphs and trees</li> <li>• Recursion</li> <li>• Shortest Paths</li> <li>• Boolean algebra and K-Maps</li> <li>• Ethical and legal issues</li> </ul>
Criminology	Unit 4  45 minutes  Students have copy of specification	<b>L01:</b> <ul style="list-style-type: none"> <li>• AC 1.1 describe processes used for law making</li> <li>• AC 1.2 describe organisation of CJS in England and Wales</li> <li>• AC 1.3 - describe models of criminal justice</li> </ul> <b>L02:</b> <ul style="list-style-type: none"> <li>• AC 2.1 - explain forms of social control</li> <li>• AC 2.2 - discuss the aims of punishment</li> </ul>

Subject	Summary of Exam (Type/length)	Topic content
<b>Economics</b>	<p>Theme 1 and Theme 2 content <b>ONLY</b></p> <p>90 minutes 75 marks</p> <p>40 marks from Theme 1</p> <p>35 marks from Theme 2</p>	<p><b>Theme 1 topic content:</b></p> <ul style="list-style-type: none"> <li>• Nature of Economics – introductory work, e.g. PPFs and Subjective/Objective economic ideas</li> <li>• Supply &amp; Demand</li> <li>• Revenue</li> <li>• Elasticity – PED PES CPED</li> <li>• Market Failure – a focus on:</li> <li>• Externalities (including appropriate diagram use)</li> <li>• Imperfect information</li> </ul> <p><b>Theme 2 topic content:</b></p> <ul style="list-style-type: none"> <li>• Multiplier</li> <li>• Economic growth</li> <li>• Measures of economic performance/standard of living.</li> <li>• Monetary Policy</li> <li>• Fiscal Policy</li> </ul>
<b>English Literature</b>	<p>1 hour 15 minutes</p> <p><b>Paper 2</b> Prose</p>	<p>Dracula/ Little Stranger</p> <ul style="list-style-type: none"> <li>• <b>Choice</b> of two comparative essays (you answer one of them)</li> <li>• Copies of blank texts (not your own)</li> </ul>
<b>French</b>	<p>90 minutes</p> <p>Writing on Y12 topics 1 hour</p> <p>Listening and reading 30 minutes</p>	<p><b>Writing</b></p> <ul style="list-style-type: none"> <li>• Unit 1 la famille</li> <li>• Unit 3 le monde du travail</li> <li>• Unit 4 la musique</li> <li>• Unit 5 les médias</li> </ul> <p><b>Listening, Reading</b></p> <ul style="list-style-type: none"> <li>• Unit 1 la famille</li> <li>• Unit 5 les médias</li> <li>• Unit 6 les festivals</li> </ul>
<b>Further Maths</b>	<p>90 minutes</p> <p>Y13 content</p>	<ul style="list-style-type: none"> <li>• Vectors: vector lines, cross product, distances.</li> <li>• Complex numbers: De Moivre's Theorem, complex powers and roots, exponential and trigonometric forms, series.</li> <li>• Matrices: 3 x 3 matrices, finding an inverse.</li> <li>• *Mechanics: centre of mass, forces and friction</li> <li>• *Modelling with Algorithms: Packing &amp; sorting, Graph theory, minimum spanning trees, shortest paths.</li> </ul>
<b>Geography</b>	<p>A combination of Paper 1 and Paper 2</p> <p>90 minutes</p>	<p><b>Paper 1 – Hazards</b></p> <ul style="list-style-type: none"> <li>• The concept of hazards in a geographical context</li> <li>• Plate tectonics</li> <li>• Volcanic hazards</li> <li>• Seismic hazards</li> <li>• Storm hazards</li> <li>• Fires in nature</li> <li>• Case study of a multi-hazardous environment</li> <li>• Case study of a local scale hazard</li> </ul> <p><b>Paper 2 – Changing Places:</b></p> <ul style="list-style-type: none"> <li>• The concept of place</li> <li>• Categories of place (near places/far places, experienced/media places).</li> <li>• Relationships, connections, meaning and representation</li> <li>• Factors contributing to the character of places (endogenous/exogenous)</li> <li>• Meaning and representation</li> <li>• Place studies (Digbeth and Torquay)</li> </ul>

Subject	Summary of Exam (Type/length)	Topic content
<b>History</b>	Paper 1 and Paper 2  90 minutes	1 essay for the USA and 1 essay for the Britain topic.  1K – US Politics 1890 –1914, The Progressive Era, Big Business and the Government  2S - The Thatcher Government, Lessons 1-7
<b>Law</b>	Paper 2 Law Making and Tort Law  90 minutes	<b>Law Making</b> <ul style="list-style-type: none"> <li>• Legislative Process</li> <li>• Delegated Legislation</li> <li>• Statutory Interpretation</li> <li>• Judicial Precedent</li> <li>• Law Reform</li> </ul> <b>Tort Law – NO ESSAY QUESTION</b> <ul style="list-style-type: none"> <li>• Negligence</li> <li>• Occupiers Liability</li> <li>• Private Nuisance</li> <li>• Rylands v Fletcher</li> <li>• Vicarious Liability</li> </ul>
<b>Mathematics</b>	90 minutes  Year 13 content	<ul style="list-style-type: none"> <li>• Differentiation: Chain rule, product rule, quotient rule, rate of change, implicit differentiation, differentiating trig, exponentials and logarithms.</li> <li>• Trigonometry: Working with radians, arc length &amp; sector area.</li> <li>• Probability: conditional probability.</li> <li>• Functions: domain &amp; range, composites, inverses, modulus.</li> </ul>
<b>Media Studies</b>	90 minutes  Component 1 Section A Unseen Media Language (15) & Representation comparison (30)	The unseen question will be on an audio-visual text: either an advertisement or a music video  The representation comparison will be print-based. Students need to revise the print set products: Tide, Kiss of the Vampire, and the newspaper pages.
<b>OCR Sport</b>	90 minutes  Unit 1 Body Systems (in preparation for January exam)	LO1 – Skeletal System LO2 – Muscular System LO3 – Cardiovascular System LO4 – Respiratory System  Use ClassCharts for PowerPoint resources. All PowerPoints are separated into LO1, 2, 3 and 4. Exam packs / practice questions are available to pick up in the sixth form office.

Subject	Summary of Exam (Type/length)	Topic content
PE	OCR A Level PE  Physiological factors affecting performance  90 minute written exam worth 70 marks	<p><b>Overview:</b> Paper 1 is a <b>90-minute written exam worth 70 marks.</b></p> <p>It tests students' understanding of how the body works and adapts during physical activity and training, as well as the scientific principles behind performance.</p> <p><b>Content Areas:</b>  <b>Applied Anatomy and Physiology</b> – body systems, energy for exercise, and recovery.   <b>Exercise Physiology</b> – training methods, preparation, diet, and performance aids.   <b>Biomechanics</b> – motion, forces, levers, projectiles, and use of technology in sport.</p> <p><b>Question Style:</b> The paper includes a mix of <b>short-answer, data-response, and extended questions</b>, requiring application of theory to sporting examples and interpretation of scientific information.</p> <p><b>Assessment Focus:</b> Students are expected to:</p> <ul style="list-style-type: none"> <li>• Apply physiological and biomechanics knowledge to performance scenarios.</li> <li>• Analyse data and sporting situations.</li> <li>• Communicate with correct use of scientific and technical terminology.</li> </ul>
Physics	1 hour 30 minutes  70 marks of short and long answer questions from all areas of Y12 content	<p><b>Topics Assessed:</b></p> <ul style="list-style-type: none"> <li>• Particles and radiation</li> <li>• Waves</li> <li>• Mechanics</li> <li>• Materials</li> <li>• Electricity</li> <li>• SHM</li> </ul>
Psychology	1 hour 30 minutes  Calculators needed  Paper 1 – Year 12 content	<p>Paper 1 – social, cognitive, biopsychology and learning theories</p> <p>Students already provided with detailed end of topic checklists last year</p>
Religious Studies Philosophy & Ethics	1 hour 30 minutes  1 AO2 Philosophy  1 AO2 Ethics  1 AO1 Christianity	<p><b>Philosophy</b> AO2 question taken from Theme 2 Challenges to Religious Belief either D-Freud, E- Jung or F –Atheism</p> <p><b>Ethics</b> AO2 question from Themes 2 and 3 Utilitarianism, Situation Ethics, Natural Law</p> <p><b>Christianity</b> AO1 question taken from Theme 2 Religion and Belief either D- Faith and Works or E- Community of Believers</p> <p>Or AO1 question from theme 1, Birth narratives or resurrection</p>

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<b>Sociology</b>	1 hour 30 minutes  Combination of paper 1 and 2 content from Year 12	<b>Paper 1</b> Education with Methods in Context  <b>Paper 2</b> Families and Households  Students have detailed checklist from last year  Combination of short answer questions – 4 and 6 marks Essay based questions - 10 and 20 mark essays