

IT and Computer Science 2020/21	Autumn 1	Autumn 2	Spring 1	Spring 2	Summer 1	Summer 2
<p>Year 9 Computer Science - OCR GCSE Computer Science</p>	<p>Students to explore Unit 1 theory for 01 exam. Students will explore systems architecture, memory and storage.</p>	<p>Students to explore Unit 1 theory for 01 exam. Students will explore wired and wireless networks, network topologies and protocols and layers.</p>	<p>Students to explore Unit 1 theory for 01 exam. Students will explore system security and system software.</p>	<p>Students to explore Unit 1 theory for 01 exam. Students will explore ethical, legal, cultural and environmental concerns and data representation.</p>	<p>Students to explore Unit 2 theory for 02 exam. Students will explore algorithms and programming techniques and practice their coding skills.</p>	<p>Students to explore Unit 2 theory for 02 exam. Students will explore producing robust programs and programming techniques and practice their coding skills.</p>
<p>Year 9 IT - BTEC Tech Award Level 1/2 in Digital Information Technology</p>	<p>Students will develop basic IT skills: Looking at Animation skills and Word Processing skills, to produce own animation and professional reports.</p>	<p>Students will continue to develop basic IT skills: Excel skills. Students to explore and recap basic spreadsheet skills.</p>	<p>Students will develop Spreadsheet skills required for Component 2 coursework. Students will look at using spreadsheets to analyse data and draw conclusions.</p>	<p>Students will develop Spreadsheet skills required for Component 2 coursework. Students will look at using spreadsheets to analyse data and draw conclusions.</p>	<p>Students will complete their component 2 coursework. Students will use a spreadsheet to analyse data and draw conclusions.</p>	<p>Students will complete their component 2 coursework. Students will use a spreadsheet to analyse data and draw conclusions.</p>
<p>Year 10 Computer Science - OCR GCSE Computer Science</p>	<p>Students to explore Unit 1 theory for 01 exam. Students will explore systems architecture, memory and storage.</p>	<p>Students to explore Unit 1 theory for 01 exam. Students will explore wired and wireless networks, network topologies and protocols and</p>	<p>Students to explore Unit 1 theory for 01 exam. Students will explore system security and system software.</p>	<p>Students to explore Unit 1 theory for 01 exam. Students will explore ethical, legal, cultural, and environmental concerns and data representation.</p>	<p>Students to complete their Non-Exam Assessment programming projects over 20 hours of class time.</p>	<p>Students to finalise their NEA programming projects, completing the remaining few hours of the</p>

		layers.				projects. Students to also explore Unit 1 theory for 01 exam.
Year 10 IT - BTEC Tech Award Level 1/2 in Digital Information Technology	Students will recap Spreadsheet skills required for Component 2 coursework. Students will look at using spreadsheets to analyse data and draw conclusions.	Students will complete their component 2 coursework. Students will use a spreadsheet to analyse data and draw conclusions.	Students will be exploring the theory of IT for Component 3 exam. Students will explore threats to digital systems and how an organisation can manage them and responsible, legal, and ethical use of data.	Students will be exploring the theory of IT for Component 3 exam. Students will explore planning and communication in digital systems.	Students will revise Component 3 theory. Students will develop skills required for Component 1 coursework. Students will look at effective user interfaces and implementing one.	Students will complete their Component 1 coursework. Students will evaluate effective user interfaces and implement their own.
Year 11 Computer Science - OCR GCSE Computer Science	Students to recap Unit 01 Computer Systems theory.	Students to recap Unit 01 Computer Systems theory.	Students to recap Unit 02 Computational Thinking, Algorithms and Programming theory.	Students to recap Unit 02 Computational Thinking, Algorithms and Programming theory.	Students will revise Unit 01 and Unit 02 theory.	Students will revise Unit 01 and Unit 02 theory.
Year 11 IT - BTEC Tech Award Level 1/2 in Digital Information Technology	Students will be exploring the theory of IT for Component 3 exam. Students will explore threats to digital systems and how an organisation can manage them and responsible, legal and ethical use of data.	Students will be exploring the theory of IT for Component 3 exam. Students will explore planning and communication in digital systems.	Students will revise Component 3 theory.	Students will revise Component 3 theory.	Students will revise Component 3 theory.	Students will revise Component 3 theory.



<p>Year 12 Computing - BTEC Level 3 National Extended Certificate in Computing</p>	<p>Students will be exploring the theory of IT for Unit 1 exam. Students will explore Computational Thinking and Standard Methods and Techniques used to develop Algorithms.</p>	<p>Students will be exploring the theory of IT for Unit 1 exam. Students will explore Programming Paradigms and Types of Programming and Mark-up Languages.</p>	<p>Students will be applying the Unit 1 theory to exam questions. After the exam, students will be practicing the skills required for the Unit 7 IT Systems Security and Encryption coursework.</p>	<p>Students will be applying the skills required to the Unit 7 IT Systems Security and Encryption coursework.</p>	<p>Students will be applying the skills required to the Unit 7 IT Systems Security and Encryption coursework. Students will also be recapping the Unit 1 theory for the exam retake.</p>	<p>Students will be recapping the Unit 1 theory for the exam retake. Students will also explore the theory for the Unit 2 exam.</p>
<p>Year 12 IT - BTEC Level 3 National Extended Certificate in Information Technology</p>	<p>Students will be using Microsoft Access in order to create systems to manage information for the Unit 2 exam. Students will explore Designing, Creating, Testing and Evaluating database systems.</p>	<p>Students will be using Microsoft Access in order to create systems to manage information for the Unit 2 exam. Students will explore Designing, Creating, Testing and Evaluating database systems.</p>	<p>Students will be applying the Unit 2 theory and skills to exam questions. After the exam, students will be practicing the skills required for the Unit 3 Using Social Media in Business coursework.</p>	<p>Students will be applying the skills required to the Unit 3 Using Social Media in Business coursework.</p>	<p>Students will be applying the skills required to the Unit 3 Using Social Media in Business coursework. Students will also be recapping the Unit 2 skills for the exam retake.</p>	<p>Students will be recapping the Unit 2 skills for the exam retake. Students will also explore the theory for the Unit 1 exam.</p>
<p>Year 13 Computer Science - OCR A Level Computer Science</p>	<p>Students will be exploring the theory for Unit 01. Students will explore characteristics of contemporary processors, input, output, and storage devices. Students will be exploring the theory for Unit 02. Students will explore elements of computational thinking. Students will also be</p>	<p>Students will be exploring the theory for Unit 01. Students will explore software and software development. Students will be exploring the theory for Unit 02. Students will explore elements of computational thinking. Students will also be completing their programming project.</p>	<p>Students will be exploring the theory for Unit 01. Students will explore exchanging data. Students will be exploring the theory for Unit 02. Students will explore problem solving and programming. Students will also be completing their programming project.</p>	<p>Students will be exploring the theory for Unit 01. Students will explore data types, data structures and algorithms. Students will be exploring the theory for Unit 02. Students will explore problem solving and programming. Students will also be completing their programming project.</p>	<p>Students will be exploring the theory for Unit 01. Students will explore legal, moral, cultural and ethical issues. Students will be exploring the theory for Unit 02. Students will explore algorithms to solve problems and standard algorithms.</p>	<p>Students will be recapping the Unit 01 and 02 theory.</p>

	completing their programming project.					
Year 13 IT - BTEC Level 3 National Extended Certificate in Information Technology	Students will be using Microsoft Access in order to create systems to manage information for the Unit 2 exam. Students will explore Designing, Creating, Testing and Evaluating database systems.	Students will be using Microsoft Access in order to create systems to manage information for the Unit 2 exam. Students will explore Designing, Creating, Testing and Evaluating database systems.	Students will be applying the Unit 2 theory and skills to exam questions. After the exam, students will be practicing the skills required for the Unit 3 Using Social Media in Business coursework.	Students will be applying the skills required to the Unit 3 Using Social Media in Business coursework.	Students will be applying the skills required to the Unit 3 Using Social Media in Business coursework. Students will also be recapping the Unit 2 skills for the exam retake.	Students will be recapping the Unit 2 skills for the exam retake.