Year 10 Curriculum Overview

		Autumn 1	Autumn 2	Spring 1	Spring 2	Summer 1	Summer 2
CORE CURRICULUM	English	Students in Year 10 prepare for GCSE English Literature, for which they undertake public examinations in May. Students begin GCSE English Language at the end of the year.					
		An Inspector Calls - interpreting ideas, characters, themes, plot, language and structure, pre- and post- WW1/WW2 context, capitalism and socialism	**A Christmas Carol -** interpreting ideas, characters, themes, plot, language and structure and context	**Revision of Macbeth** - Key focus on exam skills, revision of characters and themes , **Unseen poetry** - applying language analysis and comparison skills	**Preparation for GCSE Literature exams** - Revision of all four texts (An Inspector Calls, Macbeth, A Christmas Carol, Unseen Poetry)		**Introduction to GCSE English Language -** spoken language features, formal and informal language, Standard English vs slang, analysing, writing and delivering speeches
	Maths	**Right-angled triangles and multiplicative reasoning-** percentage changes, proportion and compound measures (Foundation) **Trigonometry and further statistics-** Sampling and interpreting and representing data (Higher)	**Constructions, loci and bearings-** calculating and reading them including the use of scale **Quadratic equations and graphs-** plotting and solving both graphically and algebraically (Foundation) **Equations and graphs-** simultaneous, quadratic and cubic as well as inequalities **and circle theorems** (Higher)	**Perimeter, area and volume-** including circles and sectors, **fractions, indices and standard form-** converting and calculating with (Foundation) v**ectors and geometric proof and proportion and graphs -** both direct and indirect using the constant of proportionality (Higher)	**Congruence, similarity and vectors-** not including congruent proofs and only calculating with column vectors, **More Algebra-** cubics and reciprocals graphs, simultaneous equations, rearranging formula and simple proofs (Foundation) **More algebra -** rearranging equations, algebraic fractions, surds, functions and proof (Higher)	**Personalised content** - Individual class teachers to use assessment from both year 9 and 10 to address areas that require further focus	
	Combined Science	All Yr 10 students will follow the Combined Science curriculum covering three areas of Science for a Double GCSE Award in Science, unless they opt for Separate Science where additional content will be covered for three separate GCSEs (below)					
	Chemistry	**Groups in the Periodic Table -** Group 1, Group 7, halogen reactivity, Group 0, **rates of reaction and energy change -** catalysts, factors affecting reaction, exothermic/endothermic reaction, energy changes		**Fuels and earth science -** crude oil and gas, combustion, pollution, the Earth's atmosphere, hydrocarbons, climate change		**Obtaining and using metals -** properties, reactivity, ores, oxidation and reduction, life cycle assessment and recycling	
	Biology	**Health, disease and medicine -** cardiovascular disease, non-communicable diseases, pathogens, the immune system, antibiotics, **plant structures -** photosynthesis, absorbing water and mineral ions, transpiration and translocation		**Animal co-ordination, control and homeostasis** - hormones, metabolic rate, adrenalin, menstrual cycle, blood glucose, Type 2 diabetes		**Exchange and transport in animals -** effective transport and exchange, circulatory system, the heart, cellular respiration	
	Physics	**Radioactivity -** atomic models, radiation, radioactive decay, dangers , **light and electromagnetic spectrum -** ray diagrams,refraction, EM waves, long/short wavelengths		**Electricity -** circuits, energy, charge, current, resistance, power, transferring energy, safety		**Magnetism -** magnets and magnetic fields, electromagnetism, electromagnetic induction, the National Grid, transformers and energy, **motion -** vectors and scalars, distance/time graphs, acceleration, velocity/time graphs	
	PE	Yr 10 students will have access to a range of sports and activities throughout the year, with opportunities to develop confidence, apply physical skills and engage in cooperative and competitive activity with others.					
		Rugby, netball, basketball, badminton, walking, handball, dodgeball, endball	**Rugby, netball, basketball, badminton, walking, handball, dodgeball, endball**	**Rugby, netball, football, badminton, walking, handball, dodgeball, endball, OAA (Outdoor Adventurous Activities)**	**Rugby, netball, football, badminton, walking, handball, dodgeball, endball, OAA (Outdoor Adventurous Activities)**	**Dodgeball, fitness, longball, cricket, rounders, softball, tennis, athletics**	**Dodgeball, fitness, longball, cricket, rounders, softball, tennis, athletics**
	RE/PSHE	**Christian belief and teachings -** nature of God, the Trinity, Jesus, biblical accounts of creation	**Christian practices -** worship, sacrament, prayer, public and private acts of worship	**The existence of God -** the question of God, experience of God, the nature of reality	**Relationships and family -** the role of men and women, Christian and Islam views on gender equality	**Islamic beliefs and teachings -** core belief, six articles of faith, nature of Allah, prophethood, books	**Islamic practices -** five pillars of Islam, importance of practices, pubᵭic and private acts of worship, Shi'a and Sunni Muslims
		3 x Yr 10 PSHE lessons will be delivered at the teacher's discretion throughout the year.A further series of PSHE lessons are delivered to Yr 10 students through the tutor time curriculum in the Summer Term.					
		Body health and sexual health- body image, physical wellbeing, teenage relationships, sexting, STIs		**Physical health and mental health -** mental wellbeing, importance of sleep and hydration, exercise and diet		**Sexual health and contraception -** consent and the law, relationships, methods of contraception and emergency contraception, sexual exploitation	
EBACC SUBJECTS - Students select *at least* one as a compulsory option	Separate Science	Students opting for Separate Science will study for three GCSEs in Chemistry, Physics and Biology respectively.					
	Chemistry	**Quantitative chemistry -** masses and empirical formulae, conservation of mass, moles, atom economy, **groups in the periodic table -** Group 1, Group 7, halogen reactivity, Group 0, **electrolytic processes -** compounds, solutions, using electrolysis		**Rates of reaction and energy change** - catalysts, factors affecting reaction, exothermic/endothermic reaction, energy changes, **Fuels and earth science** - crude oil and gas, combustion, pollution, the Earth's atmosphere, hydrocarbons, climate change		**Qualitative analysis -** bulk and surface properties, flame tests and photometry, cations and anions, choosing materials, composite materials, nanoparticles	
	Biology	**Health, disease and medicine** - cardiovascular disease, non-communicable diseases, pathogens, the immune system, antibiotics, virus life cycles, plant defences/diseases, **plant structures -** photosynthesis, absorbing water and mineral ions, transpiration and translocation , plant hormones, plant adaptations		**Animal co-ordination, control and homeostasis -** hormones, metabolic rate, adrenalin, menstrual cycle, blood glucose, Type 2 diabetes, thermoregulation, the kidneys		**Exchange and transport in animals -** effective transport and exchange, diffusion, circulatory system, the heart, cellular respiration	
	Physics	**Radioactivity -** atomic models, radiation, radioactive decay, dangers , radioactivity in medicine, nuclear energy, fission/fusion, **light and electromagnetic spectrum -** ray diagrams, refraction, colour, lenses, EM waves, long/short wavelengths,		**Electricity -** circuits, energy, charge, current, resistance, power, transferring energy, electrical safety, static electricity, electric fields		**Magnetism -** magnetic fields, magnetic forces, electromagnetism, electromagnetic induction, the National Grid, transformers and energy, **motion** - vectors and scalars, distance/time graphs, acceleration, velocity/time graphs	
	Computer Science	**Hardware -** input/output devices, memory, storage, CPU, SSDs, motherboard, computer architecture and storage, **logic -** binary/denary, binary/hex, logic gates, and/or/not, **software systems -** operating systems, firewalls, encryption, defragmentation	**Ethical, legal, cultural and environmental issues -** hardware disposal, exposure to chemicals/materials, religious/cultural problems, Government surveillance, VPNs for security, phishing/pharming and internet dangers	**Programming -** Python skills and commands (if, else, elif, print, input), iteration, sequence, selection, data constructs, string manipulation lists, arrays, data dictionaries	**Computational thinking -** pattern recognition, abstraction, decomposition, algorithm development	**Robust programming -** considerations of software design, minimising security risks, testing, software lifecycle	**Networks and networking -** wired and wireless networks, protocols and protocol stacks, networking equipment, types of networks, topology, packet switching, the internet and its protocols
	History	**Living under Nazi rule, 1933-1945: Dictatorship, 1933-1934 -** Hitler and the Nazi party, establishing power, **Control and opposition, 1933-1939 -** the SS, the Gestapo, concentration camps, propaganda, opposition to Nazi rule including the Left, church leaders, youth groups, **Changing Lives, 1933-1939 -** impact on men, women and young people, persecution of Jews, racial policy, **Germany in War, 1939 - 1945 -** war economy, opposition to war, impact on German people, **Occupation** - eastern and western Europe, ghettos, death camps, Einsatzgruppen			**Viking Expansion**, c.750 - 1050: **Scandinavian homelands** - landscape, society and life, Viking ships, trade, beliefs and rituals, **Volga vikings** - settlement and trade with Arab world, Constantinople and Byzantine Empire, **raiders and invaders** - Britain, Ireland, Scottish Islands and France, warfare, warriors, tactics, the 'Great Heathen Army' and the Danelaw, **settlers** - Iceland, Greenland, North America, **Viking Kings** - Harald Bluetooth, Jelling, conversion to Christianity, Svein Forkbeard and invasion of England, Cnut's Anglo-Scandinavian Empire		
	Geography	**Urban issues and challenges (Bristol fieldwork) -** patterns of urban change, LICs and HICs, focus on Rio de Janeiro and Bristol, urban growth, social/economic/environmental opportunities, regeneration, urban planning and quality of life, sustainable cities		**Natural hazards -** plate tectonics, global distribution of volcanoes and earthquakes, primary and secondary impact, immediate and long-term responses, monitoring/ prediction/ planning, weather hazards, tropical storms, climate change, extreme weather		**The living world:** ecosystems - small scale ecosystems - UK, food webs and chains, global distribution, tropical rainforests - Malaysian rainforest case study, structure, plants and animals, threats to rainforest, deforestation, sustainable uses e.g. selective logging, ecotourism, hot deserts - Thar desert case study, structure, plants and animals, mining and energy, causes and prevention of desertification	
	French	**Marriage and partnerships -** personal and future relationships, immediate future and future tense	**Food and eating out -** discussing food and meals (at home and abroad), different cuisines, using verbs + infinitives, quantities	**French customs and festivals -** French celebrations compared with own, describing international festivals, revision of perfect tense, imperfect tense, mixing past tenses	**Social issues and healthy living -** describing charity/voluntary work, comparing lifestyles and diets, pluperfect tense, *en* + present participle	**Holidays and travel -** describing holiday destinations and preferences, describing holiday activities, discovering areas of France, revision and use of all tenses in context	
	Spanish	**Spanish customs and festivals -** Spanish celebrations compared with own, describing international festivals, preterite and imperfect tenses	**Home and town -** house, furniture, chores, types of houses, surroundings, ideal town, position of adjectives, prepositions, complex sentences	**Social issues and healthy living -** describing charity work, comparing lifestyles and diets, conditional, negatives, present subjunctive	**Global issues -**discussing environment issues and solutions, social issues, poverty, helping others, pluperfect using *si* , modal verbs, reflexives	**Holidays and travel -** describing holiday destinations and preferences, describing holiday activities, discovering areas of Spain, revision and use of all tenses, word order	
OPTIONS SUBJECTS - students select up to three of these to complete their four options	Animal Care	**Animal handling, -** safe handling and restraint (Unit 2), **Animal housing and accommodation -** selection of appropriate housing, preparing and maintaining accommodation, cleaning out (Unit 4) **-** collating evidence and research to independently complete coursework tasks for both units				**Animal health** (Unit 1) **-** signs of good and ill health, common diseases (causes, transmission, treatment), signs and symptoms of common parasites (prevention and treatment)	
	Art	**Project Work** (titles change and evolve each year) - currently '**Altered State' -** revisiting observational drawing and different media e.g. pencil/pen/watercolour/pastel/acrylic, revisiting print methods, textile techniques, artist research and individual enquiry		**Print development -** screen printing of aspirational figures, linked with observational drawing and artist research		**Responding to brief -** personal response using inspiration from experimentation, research and observational studies completed so far, planning for final outcomes	
	Business Studies	**Costing a business proposal (RO65)** - researching and costing a business proposal, market research, presenting data, using idea generation tools, seeking and acting on feedback		**Pitching a business proposal (RO66) -** develop brand identity, investigate promotion of product, planning and preparing a pitch, reviewing performance and business proposal, self-evaluation			
	Construction and the Built Environment	**Construction Technology -** understand structural elements of low-rise building, construction of sub-structures and super-structures	**Scientific and mathematical applications -** understand the effects of forces and temperature on materials, use mathematical techniques to solve problems	**Exploring joinery and carpentry techniques and principles -** understand tools, materials and equipment, practical skills to produce a timber frame	**Exploring brickwork and blockwork techniques and principles -** understand tools, materials and equipment, practical and safe skills to produce brick and block work	**Exploring painting and decorating techniques and principles -** understand tools, equipment and materials, safe techniques to complete surface preparation tasks and apply surface finishes	
	Dance	**A Linha Curva by Itzik Galili (anthology work 3) -** analysis of technical skills, features of production, aural setting and camera techniques. Practical exploration of Samba and key motifs	**Choreographic Skills** - stimulus, improvisation, motifs, development etc. Performance of ALC class dance at Dance Platform	**Developing and Structuring Choreography -** refining skills and linking to choreographic intentions	**Within Her Eyes by James Cousins (anthology work 4) -** analysis of technical skills, features of production, aural setting and camera techniques. Practical exploration site sensitive performance	**Solo Performance Skills -** Flux and Scoop - TEMP skills	**Duet/Trio performance -** characterisation, contact, sensitivity to other performers, musicality etc. **Emancipation of Expressionism (anthology work 5)** analysis. Mock written of all topics studied in years 9&10
	Drama	**Texts in practice 1: The Railway Children -** research and exploration of extracts of plays/film/script, explore staging ideas	**Texts in practice 2 -** rehearsing and performing, exploring different stylistic performance methods	**Hansel and Gretel/ Blood Brothers -** lighting/ set/ costume design workshops, practice and improvement exam questions	**Devising drama 1: WW1 -** exploring stimuli e.g. TIME, exploring new practitioners, devise original drama, devising workshops	**Devising drama 2 -** rehearsing and performing devised piece, consider technical effects, lighting, sound and cues, devising log	**Reflecting and exam preparation -** revision for mocks and reflection/ improvement, writing own model answers
	Food Preparation and Nutrition	Commodity 1 & the science of cooking food. **NEA 1 investigation:** enzymic browning and oxidation	Commodity 2 & the diet and good health. **NEA 1 investigation**: using different fats in sponge cakes to evaluate best results and texture	Commodity 3 & the principles of nutrition **NEA 1 investigation:** denaturation and coagulation of protein molecules, meringue making, investigating different methods to create best meringue structures	Commodity 4 & food spoilage and safety. **NEA 1 investigation:** gluten formation, bread flour, structure of bread dough, investigating best flour for bread making	Commodity 5 & deficiencies. **NEA 1 investigation:** chemical and physical structure of milk, comparison of UHT milk and fresh milk	Commodity 6 & Food provenance. **NEA 1 investigation:** thickening liquids using nuts compared with starch, evaluating the effectiveness of ground nuts as a thickener
	Graphic Design	**Refresher on design principles** Learners will revisit the design principles covered in year 9.	**Respond to unit 1 assessment brief** Learners will develop an outcome based on their given brief.	**Refresher on the work of other designers:** Learners will revisit the work of other designers and produce a research file based on their chosen designer.	**Respond to unit 2 assessment brief** Learners will develop an outcome based on their given brief.	**Respond to unit 3 assessment brief** Learners will develop an outcome based on their given brief.	**Respond to unit 3 assessment brief** Learners will develop an outcome based on their given brief.
	Hair and Beauty	**Blow drying and finishing hair -** application of skills and knowledge to practical tasks, development of personal skills and professional presentation		**Creating a hair and beauty image based on a theme -** exploration of creative skills		**Basic manicure and eyebrow shaping -** application of skills and knowledge to practical tasks, development of personal skills and professional presentation	
	Health and Social Care	**Human lifespan development - Learning Aim A:** Understand human growth and development across life stages and the factors that affect development. **Learning Aim B**: Investigate how individuals deal with life events.			**Health and social care services and values -Learning Aim B:** Be able to demonstrate care values and review own practice		
	Media Studies	**Promoting Media** - study promotion of Lego Movie in relation to Media Language, Representation, Audiences & contexts. (Trailers, print adverts, Video Game) **Mini Briefs** - responding to a brief/skills development - print media	**Promoting Media -** study promotion of Lego Movie in relation to Media Language, Representation, Audiences & contexts. (Trailers, print adverts, Video Game) **Mini Briefs -** responding to a brief/skills development - animation/video	**Music industry -** in depth study of music magazines, specifically MOJO magazine, media language & representation, magazine industry and audiences, social/ cultural contexts. **Mini Briefs** - responding to a brief/skills development - website/social media	**Music Industry -** a comparative study of a pair of music videos; industry study of BBC Radio 1 Live Lounge media language, audiences, representations. **Mini Briefs** - responding to a brief/skills development - music videos	**NEA**- based on a set of briefs released by the exam board on the 1st March. Research & planning, skills development and production.	
	Music	**Exploring Film Music, Solo Performance Skills,** Composing To A Brief Project 1	**Exploring Film Music & Devices Used By Film Composers, Ensemble Performance Skills,** Composing To A Brief Project 2	**Exploring Popular Music & Forms, Solo Performance Skills,** Composing To A Brief Project 3	**Exploring Popular Music: Genres and Styles, Ensemble Performance Skills,** Composing To A Brief Project 4	**Set Study Work 1, Solo Performance Skills,** Composing To A Brief Project 5	**Set Study Work 2, Ensemble Performance Skills, Composition Coursework:** Free Brief.
	Students opting for PE in KS4 will be coursed appropriately for either GCSE PE or Vcert Health and Fitness depending upon sporting and academic ability						
	PE (GCSE)	**Applied Anatomy and Physiology -** movement analysis, lever systems, planes of movement, axes of rotation, **practical moderation -** football, rugby, netball	**Applied Anatomy and Physiology - cardiovascular and respiratory systems,** aerobic and anaerobic exercise, **practical moderation -** basketball, hockey	**The effects of exercise on the body -** short and long term effects, **practical moderation -** badminton	**Sports Psychology -** characteristics of skilful movement, classification of skills, goal setting, mental preparation, types of guidance and feedback, **practical moderation -** skiing		**Health, fitness and well-being -** diet and nutrition, **practical moderation -** athletics, tennis
	Health and Fitness NCFE	**Components of fitness**	**Principles of training**	**Exam preparation -** revision of fitness, training and lifestyle factors		**Diet and nutrition**	**Fitness testing -** training methods
	Photography	**Transform -** workshop skills, research and experimentation	**Workshop skills -** still, gif, moving image, based on own experiences, hobbies, family, awareness campaign	**Mock exam preparation -** students begin personal response to exam paper, study of artists Bret Harvey and Hannah Backland	**Mock exam development -** experimentation with ideas and techniques to mock up final pieces	**Mock exam outcomes -** creation of final pieces based on research and experimentation, develop and present work	**Student choice -** students encouraged to build up own portfolio based on mock exam research and creation, personalisation of work, further research and experimentation
	Engineering	**BTEC Component 1a -** Understand engineering sectors, products and organisations and how they interact. **Theory -** Materials, material selection, manufacturing practices and the design process. **Practical - Tolerances and fits** demonstrated in producing a working mechanism		**BTEC Component 1b -** Explore engineering skills through the design process. Project based design unit, high level of CAD, CAM and 3D printing to produce a viable solution to chosen brief. **Theory -** Mechanical advantage, technical drawing and designing for manufacture. **Practical -** Manipulating sheet metal		**Design Project -** brief released by AQA, research and development, responding to brief, material properties and processes, impact on society and the environment, the work of other designers and companies, identifying client wants and needs	
	RE (GCSE)	**Developing understanding of Christian teachings and practices -** core beliefs, the nature of God, the Trinity, biblical accounts of Creation, Jesus, incarnation, crucifixion, resurrection, ascension, the problem of evil and suffering, **Christian practices** - worship, sacrament, prayer, pilgrimage, festivals and special days, mission, Christianity in the wider world			**Developing understanding of Islamic teachings and practices -** core beliefs, nature of Allah, prophethood, Qu'ran, angels, eschatalogical beliefs, life after death, **Islamic practices** - private and public acts of worship, Zakat, Sawm and Hajj (Five Pillars of Islam), festivals and special days, (Eid and Ramadan), understanding Jihad (striving)		
	Textiles	**Design project: cultures -** response to design brief, using design processes to create a textiles item, exploring 3D visual language and working practices, recording formal elements within specialist pathways, the role of designers, researching designers, analysis of chosen culture, designs, prototypes and samples, evaluation			**Design project: fashion from 1900 to 2000 -** investigate historical and contemporary art, craft and design practices, research of a selected time period, create mood board/ sketches and drawings, research social influences of time, develop designs, evaluate final design against designers of the time		