



Key Stage 3 Curriculum – Spring Term 2018

ART

Spring Term	Skills and Knowledge to Develop
YEAR 7 • Van Gogh / Texture	Specific descriptions of skills relating to tasks set: <ul style="list-style-type: none">• Students will explore visual texture.• Students will explore the relationship between creating visual surface and mark making.• Students should be able to choose appropriate visual textures to represent surfaces within their work.• Students should use a tonal range to successfully describe form and shape within their visual observations.• Students should show texture and surface within their visual observations.• Students should record their observations using a range of visual mediums, techniques and processes.• Students should research the work of others through practical investigation of process, technique and mediums.• Students should annotate their research and developing ideas in response to the study of Van Gogh.• Students should be able to apply knowledge of complimentary colours to their work.• Students should explore composition and colour palette to help refine their ideas and practical work.• Students should refine and reflect in their books as they experiment and learn to exploit materials, processes and techniques.• Students should show the connections made with the work of others in their personal outcomes.• Students should show that their response is supported by their research, development, exploration and refinement.• Students should respond individually and present work that is independent, creative and exciting.
YEAR 8 • Mythological Creatures: Pixar Character Development Project	Specific descriptions of skills relating to tasks set: <ul style="list-style-type: none">• Students will learn about the different stages of Pixar production and artist's roles within an animation production.• Students will understand what a Mythological Creature is and be able to differentiate between animal hybrids and human/ animal hybrids.• Drawings will have a range of tones and outlines will be created with a gentle pencil pressure before adding tone.

	<ul style="list-style-type: none"> • Student’s drawings of Myth Creatures will be created using a full range of tones. • Students should demonstrate an understanding of how to develop a character from their initial drawings. • Final design work should demonstrate an understanding of texture and complimentary colours and how these can be used to make certain elements stand out. • Students should be able to understand what ‘in situ’ means and to apply this to their character and composition. • Paint/colour work should demonstrate control. Paint will be within the lines and will be applied evenly. • Students should respond individually and present work that is independent, creative and exciting. • Students will be able to evaluate their work as it progresses.
<p>YEAR 9</p> <ul style="list-style-type: none"> • Surrealism and advertising – Salvador Dali/ Magritte/ Man Ray 	<p>Specific descriptions of skills relating to tasks set:</p> <ul style="list-style-type: none"> • Students should be able to recognise and talk about the work of Salvador Dali/ Magritte and Man Ray. • Students should be able to critically evaluate other’s work. • Students should know what Surrealism is and be able to explain it. • Students should understand what Juxtaposition, scale and metamorphosis is and be able to apply one or all of them to their own surreal ideas. • Students should create a montage within their development. • Student’s compositions must be original and show development and continuing refinement. • Students should be able to work to an advertising brief to give their initial ideas a focus. • Students work should develop and refine as they progress through the project. • A range of painting techniques should be demonstrated using sufficient skill that the paint has been applied with control. • Students should not go over their lines when shading or painting unless this is specifically meant as an expressive element. • Students should use a tonal range to successfully describe form and shape within their visual observations. • Students should record their observations using a range of visual mediums, techniques and processes. • Students should be able to annotate and evaluate their own and others’ work using subject specific vocabulary. • Students should respond individually and present work that is independent, creative and exciting.

COMPUTING

Spring Term	Skills and Knowledge to Develop
<p>YEAR 7</p> <p>Computing Theory Create a web banner - Adobe Fireworks</p>	<ul style="list-style-type: none"> • Students need to know how the development of computing was shaped by very important people within the United Kingdom. They will also learn a brief history of the computer. • Students will learn how to use Adobe Fireworks to create a banner for a website. Skills will involve creating animation, including text, simple drawing skills, importing images, special effects.
<p>YEAR 8</p> <p>Computing Theory Create web animation - Adobe Flash</p>	<ul style="list-style-type: none"> • Students will build upon their knowledge from Year 7 and learn about how computers work. This will include knowing about the basic components of a computer, including CPU, Motherboard, RAM and Hard Disk Drive. • Students will learn how to use Adobe Flash to create animations suitable for websites. This will involve basic drawing skills, animating simple graphics and complex graphics.
<p>YEAR 9</p> <p>Computing Theory Create website - Adobe Dreamweaver</p>	<ul style="list-style-type: none"> • Students will learn how information is represented on a computer including converting decimal to binary and binary to decimal and how data and images are stored by a computer. • Students will learn how to use Adobe Dreamweaver to create a basic website with interactive pages and links.

DESIGN & TECHNOLOGY

Spring Term	Skills and Knowledge to Develop	Local events/attractions that allow parents the opportunity to support your hard work
<p>YEAR 7</p> <p>Students rotate subjects, but will complete the following 4 projects over the year:</p> <ol style="list-style-type: none"> 1. Mechanical Toy - Woods 2. Health & Safety - Food room skills 3. Door Hanger - Plastics 4. Robots - Lego Mindstorms 	<ul style="list-style-type: none"> • Within the workshop – basic workshop health and safety. Materials knowledge and properties such as hard/soft woods, thermos plastics and thermosetting plastics. • Within the food room – a basic level of understanding of hygiene. A good understanding of health and safety (knife skills) and by demonstration - use of 	<p>Design Museum London.</p> <p>BBC Bitesize.</p> <p>Doddle.</p>

	<p>cooking equipment and processes (use of hob).</p> <ul style="list-style-type: none"> • Basic introduction to CAD/CAM - using 2D design/vinyl cutter. • Basic programming - Lego Mindstorms. 	
<p>YEAR 8</p> <p>Students rotate subjects, but will complete the following 4 projects over the year:</p> <ol style="list-style-type: none"> 1. Form vs Function – Woods and Metals 2. Staple Foods – Staple food groups 3. Eco-Pod – Google Sketchup 4. Rucksack Light – Plastics and Electronics 	<ul style="list-style-type: none"> • Within the workshop - developing use of hand tools and process when using woods. Materials knowledge and properties of metals - ferrous/non-ferrous. • Within the food room - a good knowledge and demonstration of equipment selection and developing of skills such as knife skills when making staple foods including wheat and flour. • 3D designing - Google SketchUp. • An introduction to electronic circuits and the soldering process including health and safety. • Developing CAD/CAM skills - using 2D design/laser cutter. 	<p>Design Museum London.</p> <p>Google SketchUp is free to download at home.</p> <p>BBC Bitesize.</p> <p>Doodle.</p>
<p>YEAR 9</p> <p>Students rotate subjects, but will complete the following 4 projects over the year:</p> <ol style="list-style-type: none"> 1. Travel Game - Woods 2. Consumer Foods - Multicultural and celebration Foods 3. Pop-Up Book – Paper engineering 4. Amplifier - Electronics 	<ul style="list-style-type: none"> • Within the workshop - independence when selecting tools and processes to work with woods. • Within the food room - proficient use of cooking equipment and processes to be able to cook multicultural foods. • An introduction to basic paper engineering and graphical skills. • Proficient use of soldering irons and the soldering process/electronics to build a working circuit. 	<p>Design Museum London.</p> <p>BBC Bitesize.</p> <p>Robert Sabuda website for pop-up book inspiration.</p> <p>Doodle.</p>

DRAMA

Spring Term	Skills and Knowledge to Develop
YEAR 7	<p>Topic: Wild West Competition</p> <p>Creating:</p> <ul style="list-style-type: none"> • Work co-operatively as a full class. • Develop character through hot seating. • Develop character through role on the wall. • Develop strategies to learn lines. • Develop physical and vocal skills. <p>Performing:</p> <ul style="list-style-type: none"> • Perform a character with confidence. • Focus on pitch, diction and accent. • Sustain an American accent. • Use performance space well to convey meaning to the audience. • Use 5 elements to perform a crafted character. • Sustain character mannerisms even when not speaking. <p>Responding:</p> <ul style="list-style-type: none"> • Use technical language. • Identify 3 improvements. • Identify 3 strengths. • To complete homework with creative flair and imagination.
YEAR 8	<p>Topic: Theatre Styles</p> <p>Creating:</p> <ul style="list-style-type: none"> • Understand and explore the techniques and skills associated with Commedia Del Arte. • Understand and explore the techniques and skills associated with Greek theatre. • Understand and explore the techniques and skills associated with Classical theatre. • Understand and explore the techniques and skills associated with Melodrama. • Work cooperatively with others. • Analyse stimulus through research and discussions. <p>Performing:</p> <ul style="list-style-type: none"> • Perform a devised piece that clearly shows understanding of a range of genre and style • Perform with focus and energy • Use relevant conventions related to style • Use costume and props to add meaning to audience experience. <p>Responding</p> <ul style="list-style-type: none"> • Identify improvements in own and other's performance

	<ul style="list-style-type: none"> • Evaluate using key terminology. • Explain differences between each style of the theatre. • Be a good member of the audience observing closely and commenting on the quality of a performance. • Write a written response to performance.
YEAR 9	<p>Topic: Devising Theatre</p> <p>Creating:</p> <ul style="list-style-type: none"> • Analyse a wide range of stimuli. • How to use time effectively in rehearsal. • To create/ develop characters and a storyline. • Writing a script. • Developing theatre using a suitable genre and style. • Produce a well-crafted character. • Work as a team professionally. • Develop rehearsal schedules. <p>Performing:</p> <ul style="list-style-type: none"> • Perform with focus and energy. • Character has a clear purpose within storyline. • Aims and intentions for performance. • Using the 5 elements to create a fully crafted character that demands the audience’s attention. • Use vocal projection, diction, pitch and pace in order to deliver an interesting storyline. • Working as a company to create accurate character relationships. <p>Responding:</p> <ul style="list-style-type: none"> • Contribute to group discussions. • Highlight strengths within own and others work. • Highlight areas of improvement within own and others work. • To use accurate drama terminology. • Write a detailed evaluation, giving specific examples and reflection of the performance. • Include snapshot moments within evaluation to demonstrate evidence.

ENGLISH

Spring Term	Skills and Knowledge to Develop	Local events / attractions that allow parents the opportunity to support your hard work
<p>YEAR 7</p> <p>At the start of Year 7, all parents are given information about the ‘Key Stage 3 Handbook: English’</p>	<p>Autumn 1 assessment: writing to describe in the form of a narrative.</p> <p>Autumn 2 assessment: reading – 19th century fiction text.</p>	<p>Straw Bear storyteller for all Year 7 and 8 students.</p> <p>Follow up cultural events in the town.</p>

<p>which they can buy to support their child's learning.</p> <p>As topics are rotated, students will cover all skills needed but at different times of the year with a range of: different novels, non-fiction, plays, poetry, Shakespeare and 19th Century literature. These skills incorporate the three strands of English: speaking and listening, reading and writing.</p>	<p>Spring 1 assessment: writing a description using a picture or title stimulus.</p> <p>Spring 2 assessment: reading – fiction, the modern novel text.</p> <p>Summer term assessment: reading and writing non-fiction based.</p> <p>Speaking and listening through the year to: Build confidence Use a range of contexts Show short presentations, individually and in groups.</p> <p>The library course followed to encourage independent reading.</p>	
<p>YEAR 8</p> <p>As topics are rotated, students will cover all skills needed but at different times of the year with a range of: different novels, non-fiction, plays, poetry, Shakespeare and 19th Century literature. These skills incorporate the three strands of English: speaking and listening, reading and writing.</p>	<p>Autumn 1 assessment: writing to describe in the form of a narrative.</p> <p>Autumn 2 assessment: reading – reading, the modern novel text.</p> <p>Spring 1 assessment: writing a description using a picture or title stimulus.</p> <p>Spring 2 assessment: reading – fiction, older fiction text.</p> <p>Summer term assessment: reading and writing non-fiction based.</p> <p>Speaking and listening through the year to: Build confidence Use a range of contexts Show short presentations, individually and in groups.</p> <p>The library course followed to encourage independent reading.</p>	<p>Straw Bear storyteller for all Year 7 and 8 students.</p> <p>Follow up cultural events in the town.</p>
<p>YEAR 9</p> <p>Throughout Year 9, suggestions are made about</p>	<p>Writing to describe or a narrative. Assessment based on modern</p>	

revision guides / resources / websites / expectations for GCSE Language and Literature.	novel. Speaking and listening <ul style="list-style-type: none"> • Build confidence. • Range of contexts. • Short presentation. 	
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GEOGRAPHY

Spring Term	Skills and Knowledge to Develop	
YEAR 7 <ul style="list-style-type: none"> • Glaciation 	Skills: <ul style="list-style-type: none"> • Produce a labelled diagram of a glacier. • Identify glacial features on an OS map. • Describe the distribution of glacial features from aerial photographs and OS maps. Knowledge: <ul style="list-style-type: none"> • Define key glacial terminology. • Describe glacial landforms formed by erosion. • Describe glacial landforms formed by deposition. • Explain how glaciers produce distinct landforms. • Explain how a glacier transports material across the land. • Explain why glaciers are under threat from climate change. • Analyse the advantages and disadvantages of tourism in areas shaped by glaciation. • Analyse efforts to protect glaciated areas. • Analyse data sources showing glacial advance or retreat. • Locate and describe where glaciers have had an effect on the UK. • Locate some largely glaciated areas around the world. • Make links to the UK topic to explain the formation of the Lake District. 	
YEAR 8 <ul style="list-style-type: none"> • Asia 	Skills: <ul style="list-style-type: none"> • To continually develop literacy skills of description, explanation and analysis. • To use a range of maps of Asia to describe physical and human landscape. • To develop research and presentation skills. Knowledge: <ul style="list-style-type: none"> • To describe the physical features of India and China. • To describe human features of India and China. • To discover China and India's cultural past. • To assess how China and India are developing economically. • To find out about the course of the River Ganges and its human uses. 	
YEAR 9	Skills:	

<ul style="list-style-type: none"> • Development 	<ul style="list-style-type: none"> • To develop literacy skills of evaluation and analysis in preparation for GCSE-style writing. • To be able to analyse trends on the demographic transition model. <p>Knowledge:</p> <ul style="list-style-type: none"> • To describe the inequalities between countries at differing levels of development. • To know what indicates varying levels of development, e.g. a country's GDP. • To learn how people in Bangladesh live their day-to-day lives. • To appreciate how people in Low Income Countries improve their lives. • To understand what is meant by the term 'emerging economy'. • To understand how development differs within a country.
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HISTORY

Spring Term	Skills and Knowledge to Develop
YEAR 7	<ul style="list-style-type: none"> • Key historical terms such as chronology, evidence, inference, cause and consequence, change and continuity. • An understanding of how the local area has changed over time.
YEAR 8	<ul style="list-style-type: none"> • Students will learn about the causes of the Reformation and the consequences of the religious changes that happened during the 16th century. • They will need to learn keywords such as Reformation, Catholic, Protestant etc. as well as key dates. These will be supplied for students.
YEAR 9	<ul style="list-style-type: none"> • Students will learn about the Industrial Revolution and effect it had upon people's lives. • They will also learn about the causes of the First World War. • Students will be given keywords and dates to learn in class to help them prepare for upcoming assessments.

MATHEMATICS

Spring Term	Skills and Knowledge to Develop
YEAR 7 <ul style="list-style-type: none"> • Visualising and Constructing • Exploring Fractions Decimals and Percentages • Calculating Fractions 	<ul style="list-style-type: none"> • Use correct notation to label lines, angles and shapes. • Write one quantity as a fraction of another. • Work out percentage increases and decreases. • Use the four operations with fractions and mixed numbers. • Know and use basic ratio notation.

<ul style="list-style-type: none"> • Decimals and Percentages • Proportional Reasoning • Pattern Sniffing • Presentation of Data. 	<ul style="list-style-type: none"> • Generate a sequence from a term-to-term rule. • Draw appropriate graphs and charts to represent data.
<p>YEAR 8</p> <ul style="list-style-type: none"> • Visualising and Constructing • Algebraic Proficiency • Investigating Angles • Presentation of Data • Calculating Space. 	<ul style="list-style-type: none"> • Use the basic index laws. • Change the subject of a formulae in 2 steps. • Factorise an expression by removing a common factor from two (or more) terms. • Find the circumference and area of a circle using the standard formulae. • Know that anything to power 0 is worth 1. • Measure and write bearings. • Be able to identify conditions for equality of angles in parallel lines. • Know how to find the angle sum in any polygon. • Find the volume of prisms, including cylinders.
<p>YEAR 9</p> <ul style="list-style-type: none"> • Pattern Sniffing • Proportional Reasoning • Solving Equations and Inequalities • Conjecturing; Algebraic Proficiency - Visualising. 	<ul style="list-style-type: none"> • Be able to continue and find the nth term of a quadratic sequence. • Change between compound units (km/h to m/s, or kg/m³ to g/cm³). • Know the meaning (and formulae) for speed, density and pressure. • Know how to represent an inequality on a number line. • Know how to solve an inequality in one unknown. • Use conditions of congruency in triangles (SSS, SAS, ASA). • Construct simple geometric proofs. • Plot graphs of quadratic functions. • Recognise the shape of a cubic and reciprocal function. • Understand the gradient function.

MODERN FOREIGN LANGUAGES

Spring Term	Skills and Knowledge to Develop
<p>YEAR 7</p> <p><u>French</u></p> <ul style="list-style-type: none"> • 12-hour clock • 24-hour clock • Daily routine • Hobbies, sports, seasons <p><u>German</u></p> <ul style="list-style-type: none"> • Colours • Personal descriptions • Animals and people 	<p>Students should:</p> <ul style="list-style-type: none"> • Be able to tell the time. • Be able to use reflexive verbs in singular forms. • Be able to say what hobbies you do and when. Express opinions about different hobbies. • Be able to use qualifiers and connectives. <ul style="list-style-type: none"> • Be able to describe how people and animals look, use adjectives with agreements. • Be able to use haben and sein.

<p>YEAR 8</p> <p><u>French</u></p> <ul style="list-style-type: none"> • School subjects • Likes and dislikes • Times and days • Past tense • Clothing colours/school uniform <p><u>German</u></p> <ul style="list-style-type: none"> • Countries • Nationalities • Types of holidays • Travel and transport 	<p>Students should:</p> <ul style="list-style-type: none"> • Be able to say subjects you like and dislike and explain why. Be able to discuss your timetable. • Be able to use the past tense. • Know types of clothing and be able to describe outfits including uniform. • Be able to say where a place is and what language they speak there. • Be aware of different types of holiday accommodation and describe a past holiday including how to travel/what you did/how to book accommodation.
<p>YEAR 9</p> <p><u>French</u></p> <ul style="list-style-type: none"> • Jobs and future plans • What you must/should do <p><u>German</u></p> <ul style="list-style-type: none"> • Jobs and future plans • What you must/should do 	<p>Students should: -</p> <ul style="list-style-type: none"> • Be able to describe jobs and use in masculine and feminine forms. • Be able to use modal verbs. • Talk about what you used to do by using the imperfect tense. • Discuss your future and past. • Be able to describe jobs and use in masculine and feminine forms. • Be able to use modal verbs. • Talk about what you used to do by using the imperfect tense. • Discuss your future and past.

MUSIC

Spring Term	Skills and Knowledge to Develop
<p>YEAR 7</p> <p>Keyboard and Notation</p>	<p>Aims:</p> <ul style="list-style-type: none"> • To learn how to read the notes in the treble clef. • To learn where the notes are on the keyboard. • To learn about note values. • To develop performing skills on the keyboard. • To learn about chords. <p>Keywords:</p> <ul style="list-style-type: none"> • Treble clef • Bass clef • Crotchet • Quaver • Minim • Dotted Minim • Semibreve • Pitch names (C, D, E etc.) • Tied notes

	<ul style="list-style-type: none"> • Chord • Triad chord
<p>YEAR 8</p> <p>Samba Music</p>	<p>Aims:</p> <ul style="list-style-type: none"> • To learn about how, when and where Samba music is used. • To learn about some of the different instruments used in Samba music. • To learn how to structure and compose a Samba composition. • To learn how to perform within a group. • To be able to aurally recognise and appreciate characteristics of Samba music. • To create a presentation about Samba music. <p>Keywords</p> <ul style="list-style-type: none"> • Ago-go bell • Surdo drum • Caixa (snare drum) • Repenique • Apito • Egg shaker • Ganza (shaker) • Tambourim • Polyrhythmic • Percussion • Call and Response
<p>YEAR 9</p> <p>Hip-hop and Grime</p>	<p>Aims:</p> <ul style="list-style-type: none"> • To understand the origins and context of Hiphop music. • To understand the stylistic features of Hiphop music. • To understand the different parts to a Hiphop song (including verse, chorus, rap, drum beat, lyrics etc.) • To create a Hiphop rhythm track. • To create Hiphop lyrics relevant to own lives. • To record their own Hiphop composition. <p>Keywords:</p> <ul style="list-style-type: none"> • Rap • Rhyming couplets • Loop • Rhythm

PHYSICAL EDUCATION

Spring Term	Skills and Knowledge to Develop
<p>YEAR 7</p> <p>Students will study a range of sports and activities throughout the year. Activities are categorised as Outwitting, net-wall, performing at maximum levels and accurate replication activities.</p>	<p>Be able to understand the physiological changes to the body as a result of exercise.</p> <p>Know how to complete a 3 part warm up, to include; Pulse raising activities, static and dynamic stretches and skill specific activities.</p> <p>Understand and develop teamwork skills and be able to demonstrate these within a practical setting.</p> <ul style="list-style-type: none"> • Netball • Football • Hockey • Dance • Gymnastics • Athletics • Striking/Fielding • Fitness
<p>YEAR 8</p> <p>Students will study a range of sports and activities throughout the year. Activities are categorised as Outwitting, net-wall, performing at maximum levels and accurate replication activities.</p>	<p>Make links to exercise and the physiological changes to the body as a result of physical activities, and be able to understand what happens to heart rates.</p> <p>Lead small groups of students through a 3 part warm up and various small activities.</p> <p>Confidently offer self and peer feedback both written and verbal. Identify others strengths and areas for improvement.</p> <ul style="list-style-type: none"> • Badminton • Hockey • Football • Athletics • Rounders • Netball • Cricket • Rugby
<p>YEAR 9</p> <p>Students will study a range of sports and activities throughout the year. Activities are</p>	<p>Identify health and skill related fitness components and how they link to individual sports, making comment about which components of fitness are more important for particular sports.</p>

<p>categorised as Outwitting, net-wall, performing at maximum levels and accurate replication activities.</p>	<p>Be able to define: Body Composition, Muscular Endurance, Aerobic Endurance, Flexibility, Strength, Speed, Coordination, Reaction Time, Agility, Balance, Power</p> <p>Confidently lead others through a 3 part warm up and small skills practices. Be able to plan and organise parts of the lesson and adapt sessions in order to meet the needs of others.</p> <ul style="list-style-type: none"> • Handball • Netball • Trampolining • Dodgeball • Athletics • Rounders • Hockey • Rugby • Volleyball
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Religious Studies

Spring Term	Skills and Knowledge to Develop
<p>YEAR 7</p> <ul style="list-style-type: none"> • Key Beliefs 	<p>In Religious Education, students will learn the key beliefs and practices of the six major religions; Christianity, Islam, Hinduism, Buddhism, Sikhism and Judaism. Students will build on their knowledge of religions and practice the important skills of explanation, comparing and contrasting, evaluating different viewpoints about matters of religions.</p>
<p>YEAR 8</p> <ul style="list-style-type: none"> • Animal Rights 	<p>The Animal Rights module explores religious views about eating meat, experimenting on animals, preserving wildlife and how we use animals in society. Students will practice the key skills of evaluation and analysis through learning about the ethics of Animal Rights. In addition, students will compare and contrast different religious views about animals and draw personal conclusions about their own views.</p>
<p>YEAR 9</p> <ul style="list-style-type: none"> • Islam • Buddhism 	<p>Students will study the religions of Islam and Buddhism in depth, covering the following areas:</p> <ul style="list-style-type: none"> • History of each faith • The founder • Main beliefs and practices. <p>In addition, students will explore Islam and Buddhism in the contemporary world. Focussing on exploring the issues of gender equality, terrorism and crime and punishment.</p>

SCIENCE

Spring Term	Skills and Knowledge to Develop
<p>YEAR 7</p> <ul style="list-style-type: none"> • Cells and reproduction • Explaining physical changes • Forces and their effects • Eating, drinking and breathing 	<ul style="list-style-type: none"> • Analyse: analyse patterns, discuss limitations, draw conclusions and present data. • Communication: communicate ideas, construct explanations, justify opinions and critique claims. • Enquire: collect data, devise questions, plan variables and test hypotheses. • Solve: calculate, estimate, examine and review theories. • Scientific knowledge and conceptual understanding through the specific disciplines of biology, chemistry and physics • Understanding of the nature, processes and methods of science through different types of science enquiries that help them to answer scientific questions about the world around them. • Understand the uses and implications of science, today and for the future. • Practical skills: microscopy, measurements, observations, safety, timing, planning, model making and evaluation.
<p>YEAR 8</p> <ul style="list-style-type: none"> • Getting the energy your body needs • Explaining chemical changes • Waves and energy transfer • Our health and the effect of drugs 	<ul style="list-style-type: none"> • Analyse: analyse patterns, discuss limitations, draw conclusions and present data. • Communication: communicate ideas, construct explanations, justify opinions and critique claims. • Enquire: collect data, devise questions, plan variables and test hypotheses. • Solve: calculate, estimate, examine and review theories. • Scientific knowledge and conceptual understanding through the specific disciplines of biology, chemistry and physics. • Understanding of the nature, processes and methods of science through different types of science enquiries that help them to answer scientific questions about the world around them. • Understand the uses and implications of science, today and for the future. • Practical skills: microscopy, measurements, observations, safety, timing, planning, model making and evaluation.
<p>YEAR 9</p> <ul style="list-style-type: none"> • Cells • Organisation • Particles • Atoms and the Periodic Table 	<ul style="list-style-type: none"> • Develop scientific thinking: understand how methods develop, use a variety of models, make predictions, solve problems, develop scientific explanations and understanding, consider ethical issues, explain every day applications of science, evaluate evidence and risks, review and communicate results. • Experimental skills and strategies: develop hypotheses, plan experiments, test hypotheses, check data, explore phenomena, select appropriate methods/techniques and equipment, make observations, evaluate methods, carry out experiments reliably and safely.

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| | <ul style="list-style-type: none">• Analysis and evaluation: present observations and other data using appropriate methods, translate data, complete calculations and mathematical analysis, make estimations, interpret results/observations, present reasoned explanations, communicate scientific rationale, conclusions, methods and evaluations, be objective, accurate and precise.• Scientific vocabulary: use correct scientific vocabulary, terminology and definitions, recognise the importance of scientific terminology and quantities, use the correct SI units, use prefixes, powers of ten and orders of magnitude, interconvert units and use appropriate significant figures in calculations. |
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