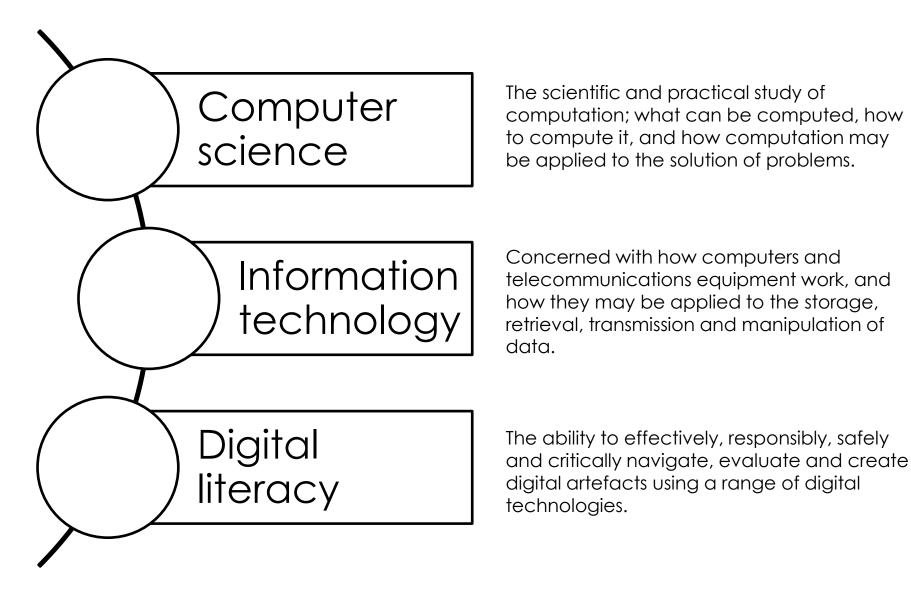
There are three strands to the computing curriculum:



	EYFS				
Subject content from the programme of study	What are our computing themes or unit titles? Content may be split between themes or units.	When will pupils be taught this?	Links with other subjects?	Opportunities for pupils to apply basic skills	
Pupils should be taught to understand what algorithms are; how they are implemented as programs on digital devices; and that programs execute by following precise and unambiguous instructions.	Programme Bee Bots for directional movement using simple commands - understand what algorithms are - learn that programs execute by following precise and unambiguous instructions	Rec Spring 1/2	ELG: Speaking ELG: Managing Self	Children to learn simple commands – forward, back, left, right, pause and stop	
Pupils should be taught to use technology safely and respectfully, keeping personal information private; identify where to go for help and support when they have concerns about content or contact on the internet or other online technologies.	Digital Citizenship: Privacy and security - Meet Guts of the Digital Citizens! How do you stay safe online? - keeping personal information private - identify where to go for help and support	Rec Autumn 2	P.S.H.E Jigsaw sessions		

Key Stage One					
Subject content from the programme of study	What are our computing themes or unit titles? Content may be split between themes or units.	When will pupils be taught this?	Links with other subjects?	Opportunities for pupils to apply basic skills	
Pupils should be taught to understand what algorithms are; how they are implemented as programs on digital devices; and that programs execute by following precise and unambiguous instructions.	 Programme Bee Bots for directional movement around a circuit, using extensive sequences -understand how algorithms are implemented as programs on digital devices - learn that programs execute by following precise and unambiguous instructions Create a maze game in scratch, programming a sprite to move around a background of their own design - understand what algorithms are implemented as programs on digital devices - learn that programs execute by following precise and unambiguous instructions 	Y1 Summer 1 Y2 Spring 2	History - Fire of London	Children to program a bee bot using specific instructions Simple step by step game	
Pupils should be taught to create and debug simple programs.	Create simple programmes to move Bee Bots using directional movement - create simple programs Use algorithms to create a sequence in Scratch in order to	Y1 Summer 1 Y2 Spring 2	History - Fire	Children to use specific instructions and iPads	
	move a sprite around a background within a game - create simple programs - test and debug the code used within the game	TZ Spring Z	of London	Simple step by step game	
Pupils should be taught to use logical reasoning to predict the behaviour of simple programs.	Use algorithms to create a sequence in Scratch and move a sprite around a background, considering how changes to the code will impact the behaviour of the sprite - use logical reasoning to predict the behaviour of simple programs	Y2 Spring 2		Create a simple step by step game	

Key Stage One					
Subject content from the programme of study	What are our computing themes or unit titles? Content may be split between themes or units.	When will pupils be taught this?	Links with other subjects?	Opportunities for pupils to apply basic skills	
Pupils should be taught to use technology purposefully to create, organise, store, manipulate and retrieve digital content.	Use cameras to take and edit photographs - Children will use the iPads to take photos of finished DT products. They will look at what makes a photo effective and edit images. They will then retrieve their image, rename it and send it for printing via Airdrop - create, manipulate and retrieve digital content - organise content by renaming images	Y2 Autumn 1	DT – take photos of and evaluate final product	Take a photo and edit it using a success criteria	
	Use Microsoft PowerPoint to practise typing skills and combine text and symbols within a document - Store and retrieve work using a shared file labelled #Y2	Y2 Summer 1			
Pupils should be taught to recognise common uses of information technology beyond school.	Local area study – Children to use iPads to take photographs of the human and physical features around Standish to be able to discuss these in more detail upon returning to school - recognise common uses of information technology beyond school	Y1 Spring 1	Geography – Local area study	Ask what object would pupils find hardest to live without and would this object change for different	
	Weather research task - Children will understand how to use web services to locate information on the internet. They will then use screen grab features to capture images to use and present this information using a green screen - recognise common uses of information technology beyond school	Y1 Summer 1	Science – weather	family members	
	Use technology for research – Children will use iPads and VR headsets to compare climates of different countries - recognise common uses of information technology beyond school Use iPads to document the growth of plants over time and record changes	Y1 Autumn 2	Geography – comparing climates. England/Kalaha ri Desert Science - Plants		
	- recognise common uses of information technology beyond school	Y2 Spring 1			
Pupils should be taught to use technology safely and respectfully, keeping personal	Digital Citizenship: Privacy and security - Safety in my Online Neighbourhood <i>How do you go places safely online?</i> - use technology safely and respectfully	Y1 Summer	Collective Worship		
	Digital Citizenship: Privacy and security - Internet Traffic Light How do you stay safe when visiting a website or app? - use technology safely and respectfully - keeping personal information private - identify where to go for help and support	Y2 Summer 1	Assemblies		
contact on the internet or other online technologies.					

Key Stage Two ¹					
Subject content from the programme of study	What are our computing themes or unit titles? Content may be split between themes or units.	When will pupils be taught this?	Links with other subjects?	Opportunities for pupils to apply basic skills	
Pupils should be taught to design, write and debug programs that accomplish specific goals, including controlling or simulating physical systems; solve	Scratch - Uncovering Tutankhamun's tomb - Use algorithms to create an animation and consider issues preventing the sequence from completing. Once issues have been identified, children will debug the program to fix this - design and write simple programs - debug programs	Y3 Summer	History – Ancient Egypt	Children will apply the techniques used and new skills to create a game at the end of the unit	
problems by decomposing them into smaller parts.	Coding for Micro:bit – Programme micro:bits to make a simple animation linked to volcanoes. The external device will be programmed so that it simulates the eruption of a volcano when shook - design programs for a specific goal - Simulate physical systems	Y4 Summer	Geography - Volcanoes		
	Coding using Micro:bit to programme a game on an external device - design, write and debug programs that accomplish specific goals - controlling or simulating physical systems	Y5 Summer			
	Develop an interactive game on Scratch - Debug independently to ensure varying movements, interaction between sprites and random operations - design, write and debug programs that accomplish specific goals - solve problems by decomposing them into smaller parts	Y6 Summer	Science – Evolution		

	Key Stage Two ¹			
Subject content from the programme of study	What are our computing themes or unit titles? Content may be split between themes or units.	When will pupils be taught this?	Links with other subjects?	Opportunities for pupils to apply basic skills
Pupils should be taught to use sequence, selection, and repetition in programs; work with variables and various forms of input and output.	Scratch - Uncovering Tutankhamun's tomb - Use algorithms to create an animation that follows a sequence to make sprites move and interact - use sequence, selection, and repetition in programs Scratch - Create an information game testing and applying different variables and using problem solving to develop	Y3 Summer	History – Ancient Egypt	Children will learn the techniques used and create a game at the end of the unit
	programming skills - work with variables and various forms of input and output	Y4 Autumn	History – Ancient Greeks	Maths – positional language and measuring this in
	Create a complex Space Shuttle movement game on Scratch, adding features that change designs of sprites and backgrounds and troubleshoot the different variables to help improve the functionality - use sequence, selection, and repetition in programs - work with variables and various forms of input and output	Y5 Autumn 1	Science - Space	degrees
	CAD/3D printing - input a design into the CAD software then troubleshoot, check, and adjust final product before 3D printing - work with variables and various forms of input and output	Y5 Autumn 1	D&T - hats	
	Use algorithms and factual information to create a score based, interactive game using Scratch software, ensuring varying movements, interaction between sprites and random operations - use sequence, selection, and repetition in programs - work with variables and various forms of input and output	Y6 Summer	Science – Evolution	

	Key Stage Two ¹					
Subject content from the programme of study	What are our computing themes or unit titles? Content may be split between themes or units.	When will pupils be taught this?	Links with other subjects?	Opportunities for pupils to apply basic skills		
Pupils should be taught to use logical reasoning to explain how some simple algorithms work and to detect and correct errors in algorithms and programs.	Uncovering Tutankhamun's tomb Scratch – Explain how algorithms work to create a fact, based animation, troubleshooting the sequence to correct any errors within the game - use logical reasoning to explain simple algorithms - detect and correct errors in algorithms	Y3 Summer	History – Ancient Egypt	Children will learn the techniques used and create a game at the end of the unit		
	Scratch - Use problem solving and reasoning to detect and correct errors within the sprite's movement and score tracker - use logical reasoning to explain simple algorithms - detect and correct errors in algorithms	Y4 Autumn	History			
	Scratch Space Shuttle movement game - Troubleshoot the different variables to help improve the functionality - detect and correct errors in algorithms	Y5 Autumn 1				
	Scratch interactive game – Evaluate the varying movements and interactions between sprites and identify errors in the algorithms which impact the game's functionality - detect and correct errors in algorithms	Y6 Summer	Science - Evolution			
Pupils should be taught to understand computer networks including the	Children will research Rivers - world wide web	Y3 Spring 1	Geography	Create, fact files, power points, documentaries		
internet; how they can provide multiple services, such as the world wide web;	Children will research the Romans - world wide web	Y4 Spring 2	History	docomentaties		
and the opportunities they offer for communication and collaboration.	Children will research the Rainforest - world wide web	Y5 Summer 2	Geography			
	Children will type and email their thematic enquiry question to their teacher to understand how computer networks communicate. This will then be sent to the printer so children understand how devices are part of networks - computer networks - communication and collaboration	Y6 Autumn	Science/ Geography enquiry question			
	Children will research web browsers and SEO to make a website visible - world wide web	Y6 Spring	History – Crime and Punishment			

	Key Stage Two ²			
Subject content from the programme of study	What are our computing themes o unit titles? Content may be split between themes or units.	When will pupils be taught this?	Links with other subjects?	Opportunities for pupils to apply basic skills
Pupils should be taught to use search technologies effectively, appreciate how results are selected and ranked, and be discerning in evaluating digital content.	Children will research the artist David Hockney and explore his pop art - use search technologies effectively Children will create a PowerPoint to present their enquiry question about the Ancient Greeks - use search technologies effectively Children will research the Rainforest - use search technologies effectively Children will research web browsers - use search technologies effectively Children will research web browsers - use search technologies effectively - appreciate how results are selected and ranked	Y3 Spring 2 Y4 Spring 1 Y5 Summer 2 Y6 Spring 1	Art History - Ancient Greeks Geography - Amazon Basin and rainforest History - Crime and Punishment	Digital Literacy - Logging on to a computer, saving and retrieving information and work, mouse movement Create fact files, documents and PowerPoints
Pupils should be taught to select, use and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems and content that accomplish given goals, including collecting, analysing, evaluating and presenting data and information.	 evaluate digital content Create and film a presentation using a Green Screen - Children will use iPads and VSDC/ I can present software to create a news report based on information they have researched and including visual effects added to the background use and combine a variety of software on a range of digital devices collect, analyse, evaluate and present data and information Use recording software on iPads and iMovie to create a podcast about the Romans use and combine a variety of software on a range of digital devices present data and information Create a virtual space on 5D planner - Use CAD experience to create a virtual space. Children will research and study the architecture of buildings and the features needed to make a space useable. They will then use their understanding of area and perimeter to create a 3D design of a building on the iPads use and combine a variety of software (including internet services) on a range of digital devices 	Y3 Spring Y4 Spring 2 Y5 Spring	Geography – Rivers/ Mountains History – The Roman Empire Art	Taking, retrieving, editing and using photographs alongside PowerPoints and green screen documentaries Maths – are and perimeter

Curriculum enrichments (visits, visitors, themed events etc.)

Key Stage Two ²					
Subject content from the programme of study	What are our computing themes o unit titles? Content may be split between themes or units.	When will pupils be taught this?	Links with other subjects?	Opportunities for pupils to apply basic skills	
Pupils should be taught to use technology safely, respectfully and responsibly; recognise	Digital Citizenship: Privacy and security - That's Private! What kinds of information should I keep to myself when I use the internet? - use technology safely, respectfully and responsibly	Y3 Autumn 2	PSHE Jigsaw Collective Worship		
acceptable/unacceptab le behaviour; identify a range of ways to report concerns about content	Digital Citizenship: Privacy and security - Password Power-Up How can a strong password help protect your privacy? - use technology safely, respectfully and responsibly	Y4 Autumn 2	Assemblies		
and contact.	Digital Citizenship: Privacy and security - Private and Personal Information What information about you is OK to share online? - use technology safely, respectfully and responsibly - recognise acceptable/unacceptable behaviour	Y5 Autumn 2			
	Digital Citizenship: Privacy and security – You won't believe this! What is clickbait, and how can you avoid it? - use technology safely, respectfully and responsibly - recognise acceptable/unacceptable behaviour - identify a range of ways to report concerns about content and contact	Y6 Autumn 2			
Curriculum enrichments (visits, visitors, themed events etc.)					