

The Year 6 Learner will cover the following units:

	UNIT SUMMARY	LEARNING EXPECTATIONS	THIS UNIT MEETS THESE OBJECTIVES FROM THE NATIONAL CURRICULUM:
Year 6	<p>Creating an online safety website</p> <p>In this unit, the pupils work together to create a website explaining e-safety and responsible online behaviour.</p>	<p><i>This unit will enable the children to:</i></p> <ul style="list-style-type: none"> • develop their research skills to decide what information is appropriate • understand some elements of how search engines select and rank results • question the plausibility and quality of information develop and refine their ideas and text collaboratively • develop their understanding of e-safety and responsible use of technology. 	<ul style="list-style-type: none"> • Understand computer networks including the internet; how they can provide multiple services, such as the world wide web; and the opportunities they offer for communication and collaboration. • Use search technologies effectively, appreciate how results are selected and ranked, and be discerning in evaluating digital content. • 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. • Use technology safely, respectfully and responsibly; recognise acceptable/unacceptable behaviour; identify a range of ways to report concerns about content and contact.
Year 6	<p>Programming an adventure game</p> <p>In this unit, the pupils learn a few commands of a text-based programming language (Python), enabling progression from Scratch. They create a simple, textbased adventure game.</p>	<p><i>This unit will enable the children to:</i></p> <ul style="list-style-type: none"> • Learn some of the syntax of a text-based programming language. • Use commands to display text on screen, accept typed user input, store and retrieve data using variables and select from a list. • Plan a text-based adventure with multiple 'rooms' and user interaction. • Thoroughly debug the program. 	<ul style="list-style-type: none"> • Design, write and debug programs that accomplish specific goals, including controlling or simulating physical systems; solve problems by decomposing them into smaller parts. • Use sequence, selection and repetition in programs; work with variables and various forms of input and output. • Use logical reasoning to explain how some simple algorithms work and to detect and correct errors in algorithms and programs.
Year 6	<p>Creating search and sort algorithms</p> <p>In this unit, the pupils participate in some hands-on unplugged activities that help them to develop an understanding of some important algorithms. They also investigate these when implemented as Scratch or Snap! programs.</p>	<p><i>This unit will enable the children to:</i></p> <ul style="list-style-type: none"> • Learn some of the syntax of a text-based programming language. • Use commands to display text on screen, accept typed user input, store and retrieve data using variables and select from a list. • Plan a text-based adventure with multiple 'rooms' and user interaction. • Thoroughly debug the program. 	<ul style="list-style-type: none"> • Design, write and debug programs that accomplish specific goals. • Use sequence, selection and repetition in programs; work with variables and various forms of input and output. • Use logical reasoning to explain how some simple algorithms work and to detect and correct errors in algorithms and programs.

	UNIT SUMMARY	LEARNING EXPECTATIONS	THIS UNIT MEETS THESE OBJECTIVES FROM THE NATIONAL CURRICULUM:
Year 6	<p>Creating a television advert</p> <p>In this unit, the pupils review existing adverts or promotional films, create a storyboard, shoot original footage, source other media and edit a final version of their movie.</p>	<ul style="list-style-type: none"> • Think critically about how video is used to promote a cause. • Storyboard an effective advert for a cause. • Work collaboratively to shoot suitable original footage and source additional content, acknowledging intellectual property rights. • Work collaboratively to edit the assembled content to make an effective advert. 	<ul style="list-style-type: none"> • Use search technologies effectively, appreciate how results are selected and ranked, and be discerning in evaluating digital content. • 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. • Use technology safely, respectfully and responsibly; recognise acceptable/unacceptable behaviour; identify a range of ways to report concerns about content and contact.
Year 6	<p>Exploring computer networks including the Internet</p> <p>In this unit, the pupils use unplugged activities to develop their understanding of networks; they learn about the domain name system and explore the school's network infrastructure.</p>	<ul style="list-style-type: none"> • Appreciate that computer networks transmit and receive information digitally. • Understand the basic hardware needed for computer networks to work. • Understand key features of internet communication protocols. • Develop a basic understanding of how domain names are converted to numerical IP addresses. 	<ul style="list-style-type: none"> • Understand computer networks including the internet; how they can provide multiple services, such as the world wide web; and the opportunities they offer for communication and collaboration. • Use technology safely, respectfully and responsibly; recognise acceptable/unacceptable behaviour; identify a range of ways to report concerns about content and contact.

Alongside these units, children in Year 6 will be taught about online safety at an age appropriate level, and given many opportunities to develop what we call their core computing skills (for example, saving, retrieving and organising electronic files, creating and editing different types of files, typing) that allow them to become competent and literate users of technology.