HIGHWOOD PRIMARY SCHOOL
Curriculum Statement - Computing

Intent

In line with the 2014 National Curriculum for Computing, our aim is to provide a high-quality computing education which equips children to use computational thinking and creativity to understand and change the world. By the time they leave Highwood Primary School, children will have gained key knowledge and skills in the three main areas of the computing curriculum: computer science (programming and understanding how digital systems work), information technology (using computer systems to store, retrieve and send information) and digital literacy (evaluating digital content and using technology safely and respectfully). The objectives within each strand support the development of learning across the key stages, ensuring a solid grounding for future learning and beyond.

Implementation

At Highwood Primary School, computing is taught using a blocked curriculum approach, so key computing skills are taught explicitly. In addition, the use of ICT is used across the whole school curriculum. This ensures children are able to develop depth in their knowledge and skills over the duration of each of their computing topics. All classes regularly use iPads to enhance other curriculum areas and further develop their ICT skills. Employing cross-curricular links motivates pupils and supports them to make connections and remember the steps they have been taught.
The implementation of the curriculum also ensures a balanced coverage of computer science, information technology and digital literacy. The children will have experiences of all three strands in each year group.

Impact

Our approach to the curriculum results in a fun, engaging, and high-quality computing education. The children are confident in recording their learning and progress, by using the app Seesaw, a digital platform where pupils can share and evaluate their own work, as well as that of their peers.

COMPUTING OBJECTIVES

YEAR GROUP	DIGITAL LITERACY	CODING	E-SAFETY
ONE	Uses technology purposefully to create digital content	Understands what algorithms are	Uses technology safely
	Uses technology purposefully to store digital content	Creates simple programs	Keeps personal information private
	Uses technology purposefully to retrieve digital content		Recognises common uses of information technology beyond school
TWO	Uses technology purposefully to organise digital content	Understands that algorithms are implemented as programs on digital devices	Uses technology respectfully
	Uses technology purposefully to manipulate digital content	Understands that programs execute by following precise and unambiguous instructions	Identifies where to go for help and support when they have concerns about content or contact on the internet or other online technologies
		Debugs simple programs	

YEAR GROUP	DIGITAL LITERACY	CODING	E-SAFETY
		Uses logical reasoning to predict the behaviour of simple programs	
THREE	Uses search technologies effectively	Writes programs that accomplish specific goals	Uses technology responsibly
	Uses a variety of software to accomplish given goals	Uses sequence in programs	Identifies a range of ways to report concerns about contact
	Collects information	Works with various forms of input	
	Designs and creates content	Works with various forms of output	
FOUR	Selects a variety of software to accomplish given goals	Designs programs that accomplish specific goals	Understands the opportunities computer networks offer for communication
	Selects, uses and combines internet services	Designs and creates programs	Identifies a range of ways to report concerns about content
	Analyses and evaluates information	Debugs programs that accomplish specific goals	Recognises acceptable/ unacceptable behavior
	Collects and presents data	Uses repetition in programs	
		Controls or simulates physical systems	
		Uses logical reasoning to detect and correct errors in programs	

YEAR GROUP	DIGITAL LITERACY	CODING	E-SAFETY
		Understands how computer networks can provide multiple services, such as the World Wide Web	
FIVE	Combines a variety of software to accomplish given goals	Solves problems by decomposing them into smaller parts	Understands the opportunities computer networks offer for collaboration
	Selects, uses and combines software on a range of digital devices	Uses selection in programs	Is discerning in evaluating digital content
	Analyses and evaluates data	Works with variables	
	Designs and creates systems	Uses logical reasoning to explain how some simple algorithms work	
		Uses logical reasoning to detect and correct errors in algorithms	
		Understands computer networks, including the internet	

YEAR GROUP	DIGITAL LITERACY	CODING	E-SAFETY
		Appreciates how search results are ranked	
SIX	Solves problems by decomposing them into smaller parts	Combines a variety of software to accomplish given goals	Understands the opportunities computer networks offer for collaboration
	Uses selection in programs	Selects, uses and combines software on a range of digital devices	Is discerning in evaluating digital content
	Works with variables	Analyses and evaluates data	
	Uses logical reasoning to explain how some simple algorithms work	Designs and creates systems	
	Uses logical reasoning to detect and correct errors in algorithms		
	Understands computer networks, including the internet		

YEAR GROUP	DIGITAL LITERACY	CODING	E-SAFETY
	Appreciates how search results are ranked		