

Y4 computing overview 2023-24: The Internet, Audio Editing, Repetition in Shapes

Computing	Building Skills and Disciplinary Knowledge	Approaches to	Building	Approaches to	Curricula Materials	Asse	ssed through	(T1 T2 T3)
Activity		Developing Skills	Substantive	Developing		Safe online presence Problem-solving		
		and Disciplinary	Knowledge and	Substantive		Communicati		_
		Knowledge	Understanding	Knowledge and			ing creating	
				Understanding			T	1
Algorithms and Programs	 Use sequence in programs Use selection in programs Work with various forms of input and output Use repetition in programs Work with variables Use logical reasoning to explain how some simple algorithms work 	Class/group tuition with technical guidance from the Switched On computing program	programs safely • Understand and explore databases and their uses for modern society • Understand how to communicate effectively and safely with technology • Understand how to use different programs to create digital audio. • Understand ownership and copyright implications • Understand	 Class teacher showing children existing examples Group work on creating and developing their own work Class teacher talk through programs and algorithms with opportunities to try different programs Observing algorithms and debugging them 	TERM1: The Internet Investigate the security of networks and the importance of this security Investigate the term World Wide Web and the difference between web page and website Create content for a website offline, then add content to an existing website Investigate what can and can't be done with content on websites, relating them to principles of ownership and sharing in the real world. Become familiar with the idea of fake news and how false information can be easily and quickly spread through the Internet TERM2: Audio Editing Use a device to record and playback audio Investigate copyright laws through music Plan a podcast Use Audacity to record audio and tracks, arrange and combine recordings Understand the do's and don'ts of audio recording Evaluate, alter, edit and export recordings	Most children will be able to (working at)	Some children will not yet be able to(working towards)	Some children are confidently able to (exceeding)
Databases	 Use sequence, selection, and repetition in programs Create and edit content on digital applications Use internet services to create content that presents information Use internet services to create and evaluate content that presents information Design and create content 	Class/group tuition with reference to existing databases						
Using the internet	 Use search technologies effectively Be discerning in evaluating digital content Be discerning in evaluating digital content 	 Class/group internet browsing, followed by reflective discussion 						
Problem solving	 Solve problems by decomposing them into smaller parts Design programs that accomplish specific goals Write programs that accomplish specific goals Debug programs that accomplish specific goals Use logical reasoning to detect and correct errors in algorithms and programs 	Class, then group opportunities for problem solving						
Communicat ing	 Understand the opportunities networks offer for communication and collaboration Use a variety of software (including internet services) to present information 	Observational opportunities to work as part of a group	how to approach a problem and find a solution • Understand how to create programs through planning, modifying and testing commands	 Teacher led creating and editing Observing preexisting master pieces and masters in the field 	TERM3: Repetition in Shapes Learn the basic Logo commands to read and write code Create a program in text based language Use everyday life examples about how to manage and 'chunk' daily tasks to relate to coding, then use these strategies to decompose and produce a program Use Turtle Academy Online to design a program that includes count-controlled loops, use the design to write a program and develop my program by debugging it			
SMSC	 Use technology safely, respectfully and responsibly; recognise acceptable/unacceptable behaviour To know how to seek help – where to go, and how to set privacy settings Recognise acceptable/ unacceptable behaviour Knowing how to find out about website or game policies 	Teacher guidance on safe internet use and introduction to supportive websites (NSPCC)						