KS1 National Curriculum for Computing

Pupils should be taught to:

Computer science

♣ understand what algorithms are; how they are implemented as programs on digital devices; and that programs execute by following precise and unambiguous instructions

♣ create and debug simple programs

♣ use logical reasoning to predict the behaviour of simple programs

Information Technology

♣ use technology purposefully to create, organise, store, manipulate and retrieve digital content

♣ recognise common uses of information technology beyond school

Digital Literacy

♣ 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.

Y1	Autumn 1	Autumn 2	Spring 1	Spring 2	Summer 1	Summer 2
	iSafe Online safety	iAlgorithm Giving and following instructions	iData Introducing data representation	iWrite Creating digital text	iProgram Algorithms and programming	iModel Adventure games
Y2	Autumn 1	Autumn 2	Spring 1	Spring 2	Summer 1	Summer 2

	iSafe Online safety	Computer skills Locating, opening, closing, files and folders, programs or apps. Effective use of devices. Use of touch screen (swipe, drag and drop, pinch to enlarge etc.) Use of keyboard and mouse, identification of purpose of different keys (space, return, delete, num lock etc.) Basic MS Office skills How to use the internet safely and responsibly. Effective use of remote learning software	I Do Mail Introduction to email	iAnimate Creating animations	iProgram Algorithms and programming	iPub Creating ebooks ail

KS2 National Curriculum for Computing

Pupils should be taught to:
Computer science

♣ 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

Information Technology

♣ 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

Digital Literacy

♣ use technology safely, respectfully and responsibly; recognise acceptable/unacceptable behaviour; identify a range of ways to report concerns about content and contact.

Y3	Autumn 1	Autumn 2	Spring 1	Spring 2	Summer 1	Summer 2
	iSafe Online safety	iNetwork Introducing networks	iSimulate Exploring computer simulations	iProgram Games and animation development	iData Introducing databases	iPodcast Editing audio

Y4	Autumn 1	Autumn 2	Spring 1	Spring 2	Summer 1	Summer 2
	iSafe Online safety	iProgram Making shapes and navigating mazes	iData Data representation	iMail Working together with email	iAnimate Introduction to animation	iProgram Developing computational thinking and creating programs with Scratch
Y5	Autumn 1	Autumn 2	Spring 1	Spring 2	Summer 1	Summer 2
	iSafe Online safety	iDraw Graphical drawing	iProgram Designing and developing programs	iCrypto Data and cryptography	iWeb Creating web content	iModel 3D graphical modelling
Y6	Autumn 1	Autumn 2	Spring 1	Spring 2	Summer 1	Summer 2
	iSafe Online safety	iData Introducing spreadsheets	iNetwork Networks, Data and HTML/CSS	iProgram Designing and developing programs	iApp Developing apps	iApp Developing apps