Key stage 1 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
- create and debug simple programs
- use logical reasoning to predict the behaviour of simple programs
- use technology purposefully to create, organise, store, manipulate and retrieve digital content
- recognise common uses of information technology beyond school
- 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.

Key stage 2 Pupils should be taught to:

- 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
- 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 a range of ways to report concerns about content and contact.

Year One		
Objectives: Algorithms Simple programs Predictions Organise, store, retrieve Online safety Uses of IT	Literary: instruction writing Numeracy: directions and instructions Creating posters and documents Topic: creating non fiction book	Apps: Daisy the Dinosaur (coding) 2 simple software BeeBots PuppetsPal HD Kids mosaic Twinkl Mouse control Word PP Safety penguin
Year Two		
Objectives: Algorithms Simple programs Predictions Organise, store, retrieve Online safety Uses of IT	Literary: instruction writing book creating with voice Numeracy: directions and instructions Creating graphs Topic: creating non fiction book, posters and documents Science recording experiments	Apps: Daisy the Dinosaur (coding) Book creator 2 simple software BeeBot P PuppetsPal HD Word PP Scratch junior Tynker LGFL – virtual experiments
Year Three		
Objectives: Programs to achieve goal Logical reasoning Organise, store, retrieve Computer networks Collect and present data Online safety Uses of IT	Literary: instruction writing book creating with voice and video Numeracy: directions and instructions Creating graphs, presenting graphs Topic: creating book and presentations Science recording experiments	Apps: hopscotch scratch Book creator MS Office Tynker PuppetsPal HD Imovie Code.org Online puzzle
Year Four		
Objectives: Programs to achieve goal Logical reasoning Organise, store, retrieve Computer networks Online safety Collect and present data Uses of IT	Literary: instruction writing book creating with voice and video Numeracy: directions and instructions Creating graphs, presenting graphs Topic: creating book and presentations Science recording experiments Art: modelling and sketching	Apps: Hopscotch scratch Book creator Explain everything MS office Online puzzle LGFL – virtual experiments PuppetsPal HD Code.org imovie
Year Five		
Objectives: Programs to achieve goal Logical reasoning Organise, store, retrieve Computer networks Online safety Collect and present data Uses of IT	Literary: instruction writing book creating with voice and video Numeracy: directions and instructions Creating graphs, presenting graphs Topic: creating book and presentations Science recording experiments Art: use different apps for different styles	Apps: Hacksauarus Sketch up scratch Book creator Online puzzle MS office Kodu Code.org

		Lightbot imovie
Year six		
Objectives: Design and write programs Use inputs and outputs Correct errors on programs Organise, store, retrieve Computer networks Online safety Collect and present data Uses of IT	Literary: instruction writing book creating with voice and video Numeracy: directions and instructions Creating graphs, presenting graphs Topic: creating book and presentations Science: recording experiments Art: use different apps for different styles	Apps: Hacksauarus Sketch up scratch Book creator MS office Kodu Code.org Lightbot imovie Book creator