Computing Yearly Overview

	Y1	Y2	Y3	Y4	Y5	Y6
Autumn 1 digital literacy	DL – My online life (This activity takes place over the course of the term. It covers all the DFE statutory requirements for digital literacy and online safety.)	DL – My online life (This activity takes place over the course of the term. It covers all the DFE statutory requirements for digital literacy and online safety.)	DL – My online life (This activity takes place over the course of the term. It covers all the DFE statutory requirements for digital literacy and online safety.)	DL – My online life (This activity takes place over the course of the term. It covers all the DFE statutory requirements for digital literacy and online safety.)	DL – My online life (This activity takes place over the course of the term. It covers all the DFE statutory requirements for digital literacy and online safety.)	DL – My online life (This activity takes place over the course of the term. It covers all the DFE statutory requirements for digital literacy and online safety.)
Autumn 2 information technology	IT – Talking technology (reception topic) (The children will learn how to take photos, record video and record audio. This is an important skill that will enable them to document their own learning and ideas. The children will create a Tech Museum as they get to explore and play with old technology)	IT - Presentations and typing (The children will learn to use presentation software and develop their keyboard skills.)	IT – Be digitally awesome (This unit is all about ensuring the children possess core skills with word processing, spreadsheet and presentation)	IT – Endangered animals (The children will learn online research skills, create illustrations and posters to raise awareness of our planet's endangered animals. The children will also get involved with environmental campaigns. They will make a class film about how making small changes can help)	IT - Making AR games (In this activity the children will be introduced to the world of Augmented Reality (AR). They will then be set the task of designing and creating a game that uses AR.)	IT – Solve IT club (.Children will produce their own digital guide to being a maths genius. Making videos and animations showing how to solve various maths problems. This is an opportunity to connect with other schools.)
Spring 1 computer science	CS – What is a computer? (In this unit children will learn about the different parts of a computer and iPad. They will learn new skills, tips and tricks. The children will be able to see the inner working of a computer and build their own. Includes a range of continuous provision activities.)	CS - Making games (The children will create a hero versus villain game. They will create sprites and learn the basics of using Scratch coding.)	CS - Dancing robots (The children will be using some of Scratch Jr's more advanced coding blocks to create their own interactive dancing robot game. The children will learn the important skills of critical thinking, problem solving and debugging.)	CS - Hour of code (The class will sign up for Hour of Code and work through various challenges. The class can also choose to take part in global coding events.)	IT – Binary Messages (This activity introduces binary code. It explains what binary code is and how it is used. The children then challenge each other to solve word problems by using binary code.)	CS – Crossy Roads (The children will create their own version of the popular app Crossy Roads using visual coding. They will learn about decomposition and how to evaluate games.)

Spring 2 digital literacy	**DL – Modern tales** (Using the vehicle of the children's stories, the children will learn to navigate the rules of online safety and communication. The children will make animations based on an online situation they may encounter.)	**DL - Online buddies** (This activity will explore what friendship means online. The children will learn about the do's and don'ts of communicating over the internet)	**DL – Online detectives** (This activity is designed to support children in mastering the art of advanced internet searching. They will learn new tricks to improve their searches while they try to solve puzzles and challenges.)	**DL – Real or fake** (Fake news is a serious concern and in this activity children will learn how they can sort the truth from the lies. Making videos to show what they have found out.)	**DL – Being a YouTuber** (Every child wants to be a "YouTuber". In this activity children will learn about what that means, the positives and negatives, safety tips and they will create their own video blog (vlog).)	**DL – Online Safety Dilemmas** (In this activity the children will become online safety ambassadors. They will be given modern day dilemmas. Dilemmas that children face every day online and asked to produce a series of "what to do" videos to explain how to cope online.)
Summer 1 information technology	**IT – Mini Beast** (Children will use technology to classify minibeasts. In this activity the children will learn about gathering and presenting information. They will then make their own David Attenborough style nature documentary.)	**IT – Storyland** (The children take the role of authors to write the sequel to popular children's stories. They then create illustrations for their story and record them self-reading it in order to create an audiobook to publish online.)	**IT – Rainforests** (The children will explore rainforests through new Virtual Reality (VR) apps. They will also use Augmented Reality (AR) to create their own learning games for younger children to play.)	**IT – dinosaurs** (In this activity the children will make their own summer blockbuster. They will learn all about filming techniques and storytelling skills.)	**IT – Web designer** (In this activity the children will learn about the history of the web, basic HTML, how to create their own graphics and how to publish)	**IT – Money** (The children will explore money, stocks and shares through a series of challenges and games. Creating a spreadsheet and digital book to explain the importance of understanding how money works.)
Summer 2 computer science	**CS - My Robot Friend** (In this unit children will learn all about computational thinking and problem solving with a variety of unplugged activities and online coding games.)	**CS - Code a story** (The children will write a basic story with illustrations. They will then turn this into an animated story using visual coding. The activity will introduce new concepts such as conditional language, repeat loops and debugging.)	**CS – Programing with robots** (Robots can be found almost everywhere. In this unit the children explore the history of robots and then get to program a robot around a maze.)	**CS - Game Designers** (The children will learn all about the career of games designer. They will play games, write reviews and then design and prototype their own game. Finally they will pitch their game idea)	**CS – Girls vs Boys – Stem challenges** (This activity will pit the girls against the boys in a series of creative STEM challenges. They will tackle code, maths, art, DT and lots of problem solving.)	**CS – Coding the playground** (Children will be introduced to text-based programming and how apps are made. They will complete self-paced programming challenges. Finally the class can explore connecting programmable toys and drones.)