

## INSPIRE Curriculum Synopses: Computing

<p><u>Year 3</u></p> <p>The children start the year by learning how to set up and use their <u>ipads</u> safely and responsibly.</p> <p>The first term seeks to improve children's digital efficiency by increasing their typing speed using the Touch Type unit on Purple Mash. This unit assists cross-curricular access by improving digital literacy.</p> <p>Children use Databases for the first time using the unit on Purple Mash to classify items. They create a branching database using 'yes' and 'no' questions which complements their maths work. The children's digital knowledge is deepened by exploring and creating Simulations. We will learn that computer simulations can show real or imaginary situations and begin to look at patterns and usefulness of simulations. This formalises the understanding of the importance of technology in our lives.</p> <p>During the Spring term the children complete an online safety unit which builds on work they have done in every previous year group to know how to stay safe when using the internet.</p> <p>We then build on last term's knowledge by completing a unit on branching databases.</p>	<p><u>Year 4</u></p> <p>Children begin the year explore the app Garageband using the iPads. Building on their digital musical skills first developed in Y2. We revisit rules for staying safe when working online. We experiment to explore how to create different sounds and effects using a loop system. Children then create a soundtrack to accompany a video, working collaboratively, before sharing and getting feedback from their peers.</p> <p>In Autumn 2, children study the coding unit 4.1 on Purple Mash. We begin by recapping simple codes and the vocabulary associated with coding. We introduce new skills such as repeated actions and timers, use the if/else commands, continue to debug and create their own codes.</p> <p>In Spring 1 we also the Purple Mash unit Online Safety Unit 4.2.</p> <p>We revisit how to stay safe when working online, learn about our digital footprint, how installing some apps can be unsafe and about how to develop safe and healthy levels of screen time.</p> <p>In Spring 2, Y4 study the Animation unit 4.6 on Purple Mash building on the Y2 unit on Stop, Motion Animation, this time, learning how to add backgrounds and sounds and how 'onion skinning' helps you line up the animation objects correctly.</p>	<p><u>Year 5</u></p> <p>Children build their independence in coding through the PM 5.1 unit. After reviewing vocabulary we move on to coding our own playable games creating, timers, point scores and the movable objects for the game.</p> <p>In Autumn 2, through Databases and online safety we begin to think critically about the information that we share online both about ourselves and others and what we would do if we were unhappy with something we saw. Furthermore we focus on safe searching online and use this to build in to our work on database. We work on how to navigate databases and then use this knowledge as a class to try and create our own class database.</p> <p>Game creator</p> <p>In Spring 1, building on our coding skills from autumn term we are looking at creating and designing a game. We focus upon the game level itself designing the environment (using our safe searching skills) and the obstacles for us to overcome. Once the games have been completed as a class we review each other's games completing game reviews and then publishing to purple mash.</p>	<p><u>Year 6</u></p> <p>To prepare the children for their increasing independence at high school, the Online Safety (2) Unit 6.2, children learn more about the dangers they may face online through social media and how they should respond to these, about their digital footprint, and the importance of managing their own screen time.</p> <p>To enhance their Computer Science knowledge, the children undertake a Networks (3) Unit 6.6 in Spring 2</p> <p>This short unit looks at how networks work – in terms of basic equipment, a LAN, a WAN, the internet and the world wide web, preparing them for the KS3 curriculum.</p> <p>Children in their final year, recap all previously taught skills, and are now expected to apply all their Coding knowledge independently using higher level variables and repetition commands. This concludes with the children designing their own game that uses each of these skills</p> <p>In Spring 1, through the Blogging 6.2 unit, children are taught what a blog is in this unit. They identify the features of a blog, and create their own success criteria, before learning how to make their own blog using 2Blog. They then use the blog that they have written in their Writing lessons (English books) to make their first official blog post. Children must be able to explain what the critical features of remaining safe whilst blogging are.</p>
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