St Peter's Computing Medium Term Plan

Year 5

Autumn 1	Autumn 2	Spring 1	Spring 2	Summer 1	Summer 2
Coding (CS)	**Online Safety (DL)**	**Databases (IT)**	**Word processing (IT)**	**Creating a computer game (CS)**	**Concept maps (IT)**
Key learning Begin to simplify code Create a playable game Begin to understand what a function is and how they work Understand different variable types and how they are used differently	Key learning Review sources of support when using technology and what responsible behaviour looks like Know appropriate and inappropriate text, photos and videos and the impact of sharing them online	Key learning Search for information in a database Contribute to a class database Create a database around a chosen topic	Key learning Add and edit images Use word wrap with images and text Use tables to present information Introduce templates	Key learning Plan a game Design and create the game environment To self and peer evaluate	Key learning Know the uses of a concept map Create a concept map
Key Vocabulary Function Simplify Variable	Key Vocabulary Online safety Share image Smart rules	Key Vocabulary Collaborative Sort, group, arrange Record	Key Vocabulary Styles Formatting Readability	Key Vocabulary Animation Evaluation Playability	Key Vocabulary Concept Concept map Visual
Key questions Describe how you would use variables to make (e.g. a timer countdown and a scorepad for a game)	Key questions Who do I tell if I see anything online that makes me upset or scared?	Key questions Why is the collaborative feature important? In what ways can I sort information in a database?	Key questions What is a word processor used for? What features can you use to make a document more readable?	Key questions What makes a good computer game? Why is it important to continually evaluate your game?	Key questions What is a concept map? How does a concept map help share ideas?
Key resources 2Code Code.org	Key resources Various	Key resources 2Question 2Investigate	Key resources Microsoft Word Google docs	Key resources 2DIY 3D	Key resources 2Connect
Purple Mash unit 5.1	Purple Mash unit 5.2	Purple Mash unit 5.4	Purple Mash unit 5.8	Purple Mash unit 5.5	Purple Mash unit 5.7

Autumn 1	Autumn 2	Spring 1	Spring 2	Summer 1	Summer 2
	Spreadsheets (IT)			**Computer aided design (IT)**	**Coding using scratch (CS)**
Key learning	Key learning Use formulae within a spreadsheet for conversions and to calculate area and perimeter of shapes Use a spreadsheet to model a real life problem	Key learning	Key learning	Key learning Begin to use the skills of computer aided design Explore the effect of moving points when designing Design a 3D model to fit certain criteria	Key learning Begin to simplify code Create a playable game Begin to understand what a function is and how they work Understand different variable types and how they are used differently
Key Vocabulary	Key Vocabulary Formula Equals tool	Key Vocabulary	Key Vocabulary	Key Vocabulary CAD (Computer aided design) Template Points	Key Vocabulary Function Simplify Variable
Key questions	Key questions How would you add a formula so that (e.g. the cell shows the product of 2 other cells) Explain what a spreadsheet model of a real-life situation is and what is could be used for.	Key questions	Key questions	Key questions How is CAD software used in industry? How can the objects designed in 2Design and Make be turned into 3D objects?	Key questions How does scratch compare with 2Code and code.org?
Key resources	Key resources 2Calculate	Key resources	Key resources	Key resources 2Design and Make	Key resources Scratch
Purple Mash unit	Purple Mash unit 5.3	Purple Mash unit	Purple Mash unit	Purple Mash unit 5.6	Purple Mash unit Build on Unit 5.1

DL = Digital literacy; CS = Computer science; IT = Information technology