Computing Long-Term Map

Units by term · Years 3 to 6

Birchwood Junior School

Our computing roles

Data handler · Programmer · Problem solver · Engineer · Publisher · Risk assessor

Every half term also includes analysing media, online safety and critical thinking.

	Autumn · Terms 1 and 2	Spring · Terms 3 and 4	Summer · Terms 5 and 6
Year 3	**Branching databases** Teach Computing · ×3 **Inspiration:** Oracle Database, Microsoft Access, dBASE **Product:** Examples of databases **Desktop computing** Teach Computing · ×2 **Inspiration:** Popular magazines **Product:** Examples of magazine style pages	**Network and internet** starter unit **Journey inside a computer** Kapow · starter unit **Computational thinking** Teach Computing · starter unit **Inspiration:** Tim Berners-Lee **Product:** Complete summative assessment **Programming A** Teach Computing · ×3 **Inspiration:** Bill Gates, Ada Lovelace, Alan Turing **Product:** Maze based challenge/summative assessment	**Programming B** Teach Computing · ×2 **Inspiration:** Bill Gates, Ada Lovelace, Alan Turing **Creating media** Kapow · ×2 **Inspiration:** Disney, Pixar, Dreamworks **Product:** A film trailer for a book
Year 4	**Programming A and B** Teach Computing **Inspiration:** Bill Gates, Ada Lovelace, Alan Turing **Product:** Game design that includes repetition	**Data logging** Teach Computing · ×3 **Inspiration:** Met Office **Product:** Data collected and represented **Collaborative learning** Teach Computing · ×1 **Inspiration:** Tim Berners-Lee **Product:** Summative assessments	**Photo editing** Teach Computing · ×2 **Inspiration:** Photo artists **Product:** Series of digitally manipulated pictures **Microsoft PowerPoint** Bespoke unit · ×2 **Inspiration:** [not yet chosen] **Product:** PowerPoint based on topic of learning
Year 5	**Programming A and B** Teach Computing **Inspiration:** Nintendo, Rockstar Games, EA Sports **Product:** Moving component using Crumble; quiz involving selections	**Mars Rover** Kapow · ×2 **Inspiration:** Mars rover, NASA **Product:** Binary coded examples including number and text **Data: flat-file databases** Teach Computing · ×1 **Spreadsheets: data input, representation, Excel** ×1 **Inspiration:** Oracle Database, Microsoft Access, dBASE **Product:** Create a chart using their own data, summative assessments	**Creating media: Vectors** Teach Computing · ×2 **Inspiration:** [not yet chosen] **Product:** Create a vector drawing **Sharing information** Teach Computing · ×2 **Inspiration:** Tim Berners-Lee, Alan Emtage, Larry Page, Archie (the first search engine) **Product:** Summative assessment
Year 6	**Creating media: 3D modelling** Teach Computing · ×3 **Inspiration:** Pixar **Product:** Plan, develop and evaluate a 3D model of a building **Computing systems: communication** Teach Computing · ×1 **Inspiration:** Mark Zuckerberg, Jack Dorsey, Noah Glass, Biz Stone, Evan Williams **Product:** Summative assessment	**Big data** Kapow · ×1 **Inspiration:** Apple Pay, contactless debit cards **Product:** Sort and analyse spreadsheet data **Spreadsheets** Teach Computing **Inspiration:** Excel, Numbers, Citi, Goldman Sachs **Product:** Charts showing data, questions answered using spreadsheet; summative assessment	**Introduction to Python** Kapow · ×4 **Inspiration:** Amazon, Apple and Google **Product:** Create loop using Python coding

×2, ×3 and so on show the teaching allocation for each unit, as given in the source plan.