The Fisher Way: Curriculum

The Fisher Way aims to educate and inspire with joy, faith and love because we are an inclusive Catholic community.

Successful and resilient learners who aspire to and achieve excellence

Confident individuals who can explore and communicate effectively

Responsible citizens who are active, loving and wise in all their endeavours

Subject	Computing
Year Group	Year 7

Intent	**Successful and Resilient Learners:** who can analyse problems and find efficient, creative solutions for both real world situations and artificial systems **Confident Individuals:** who can use digital technology effectively, creatively and safely in their personal lives and future careers **Responsible Citizens:** who understand the social and cultural impact that technology has on their lives and the lives of others.
Narrative	All learners will use at least 2 programming languages (Python and JavaScript through MakeBlock) to solve a variety of computational problems. All learners will understand the hardware and software components that make up computer systems, and how they communicate with one another and with other systems. All learners will undertake creative projects that involve creating, reusing and repurpose digital artefacts for a given audience. The Year 7 Computing units build on the work covered in KS2 around the safe, respectful and responsible use of technology. **Digital Graphics:** Skills from Y7 will continue to be developed, and in Y8 there will be a greater focus on using the techniques to create designs instead of recreating provided graphics. **Understanding Computers:** Skills from Y7 on the basic of hardware and networks will be developed in Y8 to include how the hardware and networks are used to store common files and represent data. **Problem Solving:** Skills from Y7 on Computational Thinking and Logic will be developed in Y8 to include how these skills are applied to create Artificial Intelligence and Machine Learning **Digital Literacy:** Online safety covered in Y7 will be built up into Y8, with a focus that develops into considering how to be a responsible as well as safe online. **Programming:** Two programming languages (Python and JavaScript through MakeBlock) are taught in both Y7 and Y8. The skills covered in the Micro:bits in Y7 is developed through Y8 by introducing the ZipHalo devices, and the Turtle programming from Y7 is developed through Y8 by introducing more console based programming."

Half term	Autumn 1	Autumn 2	Spring 1	Spring 2	Summer 1	Summer 2
Knowledge (topics studied)	School Systems and Online Safety	Games Design in Kodu	Binary and Computer Systems		Programming with Python Turtle	
Key skills	Analysing real world situations to determine how to respond to potential harmful situations and how to prevent potentially harmful situations from developing.	Creative use of software, ability to plan a piece of software and then create it based on the plan.	Numeracy around number bases and binary arithmetic. Understanding of Base 10 principles.		Resilience and positive mindset when dealing with programs that are not working.	
Cultural capital	Issues around personal safety and wellbeing when using technology - more focus on the importance of how we act online and how to respond to situations.	Understanding the software development lifecycle and how software is different from any other engineered product due to the interactive.	The Diving Bell and the Butterfly - simplest forms of communication.	Creative use of software - awareness of history of fake images (Stalin, Cottingley, Mussolini).	Problem solving and logical thinking. Breaking problems down into manageable chunks.	Problem solving and logical thinking. Breaking problems down into manageable chunks.
Assessment		End of Unit Assessment	End of Unit Assessment	End of Unit Assessment	End of Unit Assessment	End of Unit Assessment