‘Subject’ Curriculum Plan Overview

Year 9

Term	Topic	Learning	How can parents’ best support
Autumn 1	**Programming Languages & Sequencing**	Background and brief history of programming languages. Programming languages comparison Introduction to Python Writing Python code Text input and output Variables	There are a number of coding websites that students can access via home if they have access to the internet. Students have been given access to a site called tynker (tynker.com) this provides them with a number of programming languages including Python, Java and block based. The IDLE is also accessible through repl.it and students can continue to work on their tasks and projects at home.
Assessment:			
Autumn 2	**Animation**	Terminology Refresher Editing and sprites Layers Tweening & Frame by Frame Adding sound File types	If you have access to the internet via laptop or desktop, download the ‘free’ version of Hippani animation software. Using the video tutorials, you and your child could explore the basic skills required to create animations.
Assessment:			
Spring 1	**Binary and Computer Logic**	Understanding how computers work Binary conversions and arithmetic Hexadecimal and Unicode How is this linked to morse code and other levels of encryption.	Students could look up the enigma code and understand how this was developed and its purpose this will give students background knowledge of encryption. Students should look at how numbers they see everyday are made up using a base ten system. This enables an easy comparison to a base two and base sixteen system found in binary and hexadecimal.
Assessment:			
Spring 2	**Python Selection**	Decisions based on numbers If else Elif Comparing strings and numbers	There are a number of coding websites that students can access via home if they have access to the internet. Students have been given access to a site called tynker (tynker.com) this provides them with a number of programming languages including Python, Java and block based. The IDLE is also accessible through repl.it and students can continue to work on their tasks and projects at home.
Assessment:			
Summer 1	**App/Game Design**	Design your own sprites. Planning and designing a App /Game. Create an App/Game.	Search on APP stores and discuss with your child the various APPs that are available. Which ones are useful? Which ones are designed to extract money from you? What makes a good APP?
Assessment:			
Summer 2	**Python Iteration**	For loops While loop Functions Lists	There are a number of coding websites that students can access via home if they have access to the internet. Students have been given access to a site called tynker (tynker.com) this provides them with a number of programming languages including Python, Java and block based. The IDLE is also accessible through repl.it and students can continue to work on their tasks and projects at home.