## What I need to know: Y4 Computing - Computational Thinking

We nurture the curiosity to learn, the courage to lead and the compassion to care.

In this unit we are learning to understand that problems can be solved more easily with computational thinking.

Class:

Name:

What I will know			✓	Start	End	
Use decomposition to solve a problem by finding out what code was used				0	0	
Use decomposition to understand the purpose of a script of code.				0	0	
Know the four strands of computational thinking: decomposition, pattern recognition, abstraction and algorithm				0	0	
Create algorithms for a specific purpose				$\circ$	$\circ$	
Using abstraction and pattern recognition to modify code				0	0	
Know that combining computational thinking skills can help you to solve a problem.				0	0	
Understand that pattern recognition means identifying patterns to help them work out how a code works.					0	0
Understand that algorithms can be used for a number of purposes e.g. animation, games design etc					0	0
Skills I may use						
Remember: name, identify, describe  Analyse: investigate, infer, select, clar				rify imagine		
Understand: predict, recall, interpret  Create: plan, design, construct, specu						
Apply: use, show, relate, demonstrate  Evaluate: compare, assess, judge			iate			
Vocabulary I need to know						
1. I have heard the word, but I don't know what it means 2. I understand what the word means 3. I can explain whether the word means and give of						
abstraction, algorithm, code, computational thinking, decomposition, input, logical reasoning, output, pattern recognition, script, sequence, variable						
Opportunities to support English and Maths						
<ul> <li>Maths: solve problems involving multiplying and adding. 2-D shapes and 3-D shapes. recognising angles.</li> <li>English: Spoken Language – develop understanding through speculating, hypothesising, imagining and exploring ideas.</li> </ul>						
Curriculum Links and Enrichment Activities						
Physical Education: perform dances using a range of movement patterns.						

Respect Responsibility Reflection Resilience