Chase Bridge Subject Roadmaps

Our Curriculum

COMPUTING

Learning Areas: Using technology · Esafety · Coding · Word and Data processing · Creative content · Digital literacy
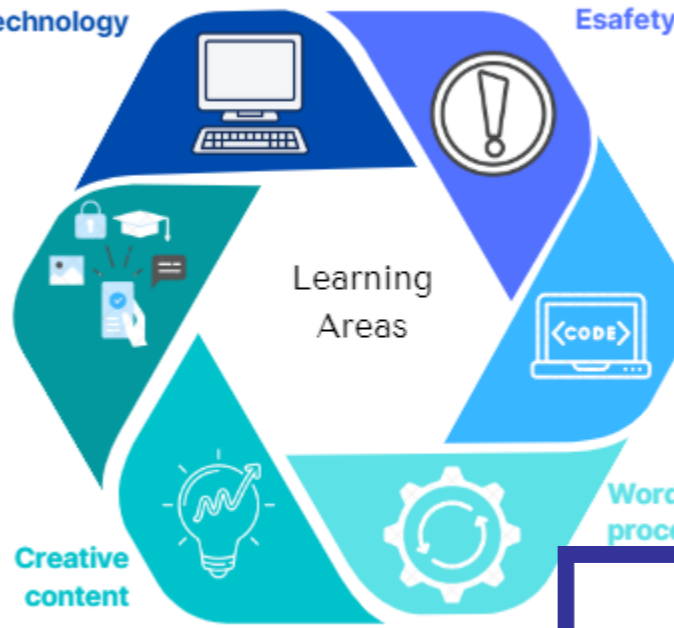
EYFS

Early Learning Goal Links:

Explore how things work
Know and talk about the different factors that support their overall health and wellbeing:- sensible amounts of 'screen time'
Access Busy Things and ActivInspire on the interactive whiteboard, for educational games and art packages
AB, ABC and ABB patterns
Sequencing - story sequencing, life cycles sequencing, times of day sequencing
Programming/algorithms/decomposition - route planning on a map or maze
Decomposition - self care, classroom routines, instructions
Creating - designing and making
Logic - odd one out in maths/phonics, reasoning in maths
Abstraction - sticking to a theme, naming, labelling

YEAR 1

Children will learn about:

Autumn:
Using Technology: logging on; move the cursor and click using a trackpad; turn on and shutdown computing equipment safely

Spring:
Online Safety: staying safe online
Word and Data Processing: type a simple sentence; change the size and colour of the text

Summer:
Creative Content: paint with different colours & different brushes; add text to a
Coding: create and debug simple programs; create instructions using pictures

YEAR 2

Children will learn about:

Autumn:
Presentation Skills: insert slides; add and type in a text box
Using the Internet: search using the words "for kids"; follow a weblink; understand how to blog safely and responsibly

Spring:
Online Safety: know what 'digital footprint' means; use a website to search for information; identify websites suitable for their age; know how to safely search for information online
Computer Art: alter the formatting of a tool to adjust the colour or size.

Summer:
Preparing for Turtle Logo: walk forward a number of steps.
Programming Turtle Logo and Scratch: draw lines of different lengths using the fd Command

YEAR 3

Children will learn about:

Autumn:
Desktop publishing: create branching presentations; draw; resize and manipulate objects; manipulate text size; align text
Internet Research: using word order to achieve desired results; how to bookmark pages; identify different forms of online information.

Spring:
Scratch: selecting characters; animation; using broadcast; receiving, showing and hiding blocks

Summer:
Coding: algorithms and instructions; if statements; debugging; writing command code.

YEAR 4

Children will learn about:

Autumn:
Online Safety: personal information; staying safe online
Word processing: font; inserting images; colour; spatial awareness

Spring:
Animation: basic and simple techniques of animation; exploring a range of animation software
Spreadsheets: organising information in a simple way; inserting information and creating a simple formula

Summer:
Scratch: questions and answers; changing the sprite; special effects and creating a quiz

YEAR 5

Children will learn about:

Autumn:
Design a 3D object: using Sketch up to design a 3D Victorian building
Web design: create a webpage; add text; add images; insert and format hyperlinks; publish and share a webpage

Spring:
Google Forms: process fillable forms; use different question formats; collect data from forms; convert qualitative data into quantitative data
Scratch: create games with a specific purpose or goal; make an object move automatically; change its appearance; changes to sprites as a consequence to an event; point-scoring

Summer:
Podcasts: create sounds by recording; editing

YEAR 6

Children will learn about:

Autumn:
Online Safety: cyberbullying; support; insecure websites; personal information; staying safe online
Spreadsheets: text and numbers; identifying and referring to cells; formulae using the SUM function.

Spring:
Scratch: selecting characters; animation; using broadcast; receiving, showing and hiding blocks
Kodu: navigating using keyboard or mouse; adding objects to a world and programming; designing a virtual environment—including moveable characters

Summer:
Film making: plan and write a script; research; digital video camera skills; Interviewing; importing and editing video files

INTENT

Children will be equipped to use computational thinking and creativity to understand and change the world. Computing first ensures digital literacy – being able to use, and express themselves and develop their ideas through, information and communication technology – at a level suitable for the future workplace and as active participants in a digital world. The core of computing is computer science, which is the principles of information and computation, how digital systems work, and how to put this knowledge to use through programming.

IMPLEMENTATION

Children will learn through a continuous curriculum which builds on the skills and understanding of previous years. Our digital literacy first approach ensures that children have the fundamental computing skills to find, evaluate, utilise, share, and create content using information technologies and the internet. Building on this knowledge and understanding, pupils are equipped to use information technology to create programs, systems and a range of content.

IMPACT

Children will be able to demonstrate their understanding through project based learning; this allows teacher assessment to take place throughout each unit. Each lesson has a key skill that is evaluated and later assessed as part of a final project. This project allows children to demonstrate their retention and proficiency with an array of skills.