



For tomorrow's digital creators.

Subject Story

Computing

Computing is a key skill in today's world; there aren't many areas of study or work that won't require a confident use of technology. We prepare children to be confident and responsible digital creators with a bespoke curriculum made just for Morden Primary. Safe computing practices, both on and offline, are modelled across the school not just within computing as a subject but embedded within all subjects.

We aim to give our children access to a wide range of devices and software to aid bringing their creativity to life. We provide a range of physical and computational problem solving (debugging) activities to foster decomposition of problems and enhance logical thinking processes to assist both individually and within collaborative work.

As a school community, we are diverse and children bring a large range of experience and skills to computing sessions. We encourage children to collaborate as much as possible to share these skills and build upon our aim to educate confident and responsible users of technology.

The National Curriculum states:

A high-quality computing education equips pupils to use computational thinking and creativity to understand and change the world. Computing has deep links with mathematics, science, and design and technology, and provides insights into both natural and artificial systems. The core of computing is computer science, in which pupils are taught the principles of information and computation, how digital systems work, and how to put this knowledge to use through programming. Building on this knowledge and understanding, pupils are equipped to use information technology to create programs, systems and a range of content. Computing also ensures that pupils become digitally literate – 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.

If you were to walk into Computing lessons at Morden, you would see:

- Reference back to the unit overview at the start of each lesson, focussing attention on the skills to be developed in the proceeding learning activities.
- Retrieval practice, giving learners the chance to consolidate previous skills and knowledge.
- Key vocabulary is included in the lesson material which is displayed on the big screen during the input.
- Intros including revision of previous session to remember skills taught
Instructional videos and or live demonstrations of skills taught and successes
- Confident and engaged learners using tools within the session to achieve the sessions objectives.
- Learners who are eager to work both as individuals and collaboratively to enhance their learning.
- Learners who will voice their thinking and question that which they don't yet understand.

- Teachers who have access to an online support engineer at all times throughout lessons to help resolve technical issues so not to interrupt the learning of the children.
- Inclusivity – learning accessible to all.

Pupil Voice

Y1: Children could talk about using Beebots and programming these to turn either left or right. Children were able to explain what an algorithm was and were observed working in teams.

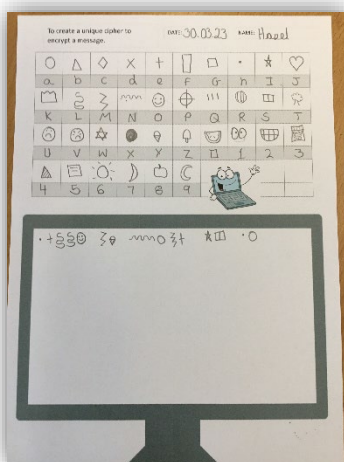
Y3: "We enjoyed gathering information using Google Forms, but sorting the data was tricky"

Y6: Showed good skill and knowledge, especially with regards to staying safe online and keeping their location and personal details secret when filming farewell videos for their digital memory box project.

An example of knowledge progression within our Computing curriculum

SUBSTANTIVE KNOWLEDGE						
	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
Topics and key vocabulary	My First Steps Login, username, password, safety	Skills Upgrade Typing, Open, Save, Edit, Find	My First Webpage WYSIWYG, Test, Save format,	Movie Trailer Frame, shot, position, Timeline	My Second Webpage HTML, TAG, CSS, Browser	Kodu Next Steps Object, Terrain, Program, Path
	A splash of colour Draw, Save, Open, Edit	Blocks of wonder 2 Sensing, click, interact, effect, debug	What's cooking Recipe, order, film, specific	Blocks of wonder 4 Input, Output, store, debug	Feel the Beat 2 Tempo, Composition, Mood	Let's go on holiday Search, cell, formula, compare
	What in the world technology, function, effect, reason	Let's get Moving Animation, Frame, Photo, Timeline	Morden Meets Audible Audio, Microphone, Level, sound	Healthy Living Research, healthy living, offline activities	Making a Movie scene, Import, Timeline, Cut	Streaming Dreaming PT1 Screen Record, Timeline, Export
	Robot programmers Program, Movement, Debug, Solve	Tell a story Image, Text, Font, Save, Open	Blocks of wonder 3 Variable, Loop, debug, broadcast	3D Sculpture Design design, dimensions, scale	The Encryption Factor Encryption, cipher, coded messages	Streaming Dreaming PT2 Screen Record, Timeline, Export
	Data sorters Order, Group, Data,	Feel the beat Beat, Tempo, Instrument,	Data sorters 2 Cell, Graph, Spreadsheet, Filter	Micro:bit Mini Computer Upload, code, input, output	Kodu first steps 3D, Terrain, Object, Program	Micro:bit Mini Computer Upload, code, input, output
	Blocks of Wonder 1 Algorithm, move, looks, debug	Robot programmers 2 Program, Algorithm, Debug, Solve, Puzzle	LAN WAN Thinking Network, LAN, WAN, IP address	Hello World Programming language, run, debug	Stop Think Share Social media, future consequences, instant communication	My Own Project Plan, delegate, upload, send/receive

Outstanding examples of learning



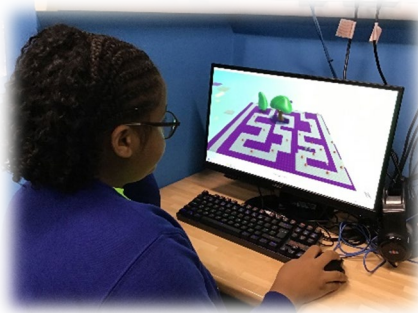
Y5 Looking at Encryption.
Starting with basic ciphers.

Y5 creating programs using
block coding in Scratch

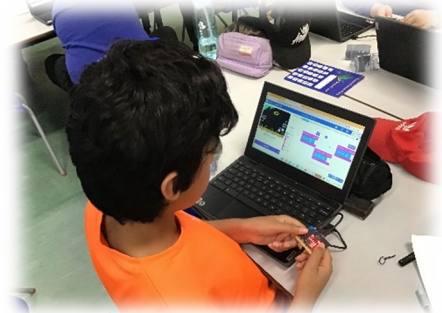
Y2 Beginning to understand
algorithms and the importance of
chronology by creating recipes.



Y3 LAN WAN Thinking,
learning about networks



Y6 Kodu Next Steps
Creating games within Kodu



Working with Micro:bit Mini
Computers

Successes in 2023 – 2024

- Use iPads and other technology in greater depth to enhance learning opportunities.
- Further develop technological resources for Early Years
- Continue to develop and improve how the children are assessed within computing and give children a channel to self-evaluate on their computing session

Priorities for 2024 – 2025

- To consistently use self-assessment tool within lessons
- To implement online portfolio for use by all children.
- Increase awareness for the whole school community on the respectful use of social media and messaging applications
- Children to start managing the Computing Lab making sure all equipment is being used, stored and kept tidy.

Ambitions for Computing at Morden Primary School

- For children working at a greater depth to tutor/work with peers in a club setting.
- For children in UKS2 to support younger children in online safety strategies and have an input into Morden Primary's social media presence.

Useful Websites

Morden subscribe annually in order to gain access to award winning educational resources to help enrich our children's curriculum content. There is so much provided by the LGFL it would take years to access it all. By use of their login information, which is available through our Morden Primary Learning Portal.

The online applications span age ranges from EYFS (Early Years and Foundation Stage) all the way through to KS3 (Key Stage 3) as well as subjects' literacy, maths, space explorations, online safety, dance, music and so many more.

