Kelvedon Hatch Community Primary School

Computing Policy

Computing Policy for Kelvedon Hatch Community Primary School

At KHCPS learning in every subject will based on the key elements contained within our Learning and Teaching Pedagogy Policy:

Show Me Boards

- Use of Show Me boards ensure all children are actively engaged and that prior learning (memories) become stronger, thus creating stronger pathways in the brain, enabling learners to build on prior knowledge.
- Show Me boards also play a crucial part in using assessment for learning to identify misconceptions immediately, allowing adults to address these at whole class or individual level immediately.
- Use of Show Me boards generates pace.
- Show Me boards should be used at the start of the lesson to revise previously taught knowledge, processes or skills in order to strengthen memory pathways in the brain.
- Show Me boards can also be used during lessons in order to enable instant whole class assessment, particularly when an 'next step' concept has been taught midway through a lesson.

Additional themes that underpin our pedagogy:

- Lessons implicitly or explicitly reflect on our support of the UN Convention on the Rights of the Child (UNCRC).
- Our strong sense of social responsibility is explicitly discussed within the context of lessons whenever possible.
- Our concrete, pictorial, abstract approach enables all children to access learning.
- Lessons actively encourage children to undertake research based on self-interest (where possible, children have access to research materials, including iPads).
- Where possible, lessons are topic-based and have links with other areas of the curriculum. For example, English skills would be explicitly referred to when writing a method in science.
- Use of computing equipment supports research and enables enhanced access to the curriculum where appropriate and possible.
- There is a culture of celebrating children's work through referring to very specific elements of the child's work or learning behaviour.
- Adults model (explicitly) how children can meet the given success criteria.
- Adults model the desired learning behaviour through modelling enthusiasm, collaborative learning, use of resources, self-interest research, referring to steps of challenge and success criteria to know if answers are correct / objectives have been achieved.
- Parents are informed of the curriculum at meetings and access to the curriculum overview is on the school website.
- Whenever possible, exciting concrete resources, footage or trips bring topics to life and feed interest and a desire to research.

- This document is a statement of the rationale, aims and processes for Computing at Kelvedon Hatch CPS.
- The Computing Lead will review the policy every four years and, should amendments be necessary, they will be brought to the attention of all staff.
- This policy **MUST BE** read in conjunction with the school's E-Safety Policy and Acceptable Use of ICT Agreement. Each child regardless of ethnic group, age, disability, special educational needs and gender will have equal access to good quality Computing resources. ICT will be used to support and challenge every child's learning. Our Computer Suite contains enough computers for each child to share which allows every child equal access. We recognise that there are some children who have greater access to computers in their home environment. Those children who do not have access at home are given opportunities to use school resources during break times, lunch times and through homework clubs.
- Computing provides an invaluable tool to support both teaching and learning. For teachers it provides fast access to a wide range of resources and enables resources to be shared across the school/LEA and nationally. This results in reduced workloads for teachers. Computing enables teachers to present information to pupils in motivating and exciting ways and provides access to experiences and learning resources that were not previously available.
- Children need to develop transferable skills to enable them to adapt in an ever changing and technology rich environment.
- During teaching of other subjects, Computing may be used to enhance learning for groups of learners:
  - by providing access to the curriculum
  - as a means of differentiation
  - as extension work
  - as a way to support and extend learning across the curriculum.

Inclusion and Equal Opportunity
Kelvedon Hatch Community Primary School, Mission Statement
Joyous, caring, respectful and ambitious
'We are a joyful, creative school that promotes a love of learning within a caring, respectful environment.'

Joyous
We aim to create leanring environments that are inspiring, fun and memorable, within a school community that loves learning and celebrates the successes made by all children, at every stage of their leanring journey.

Caring
Children, staff and the wider school community care about the welbeing of others, both within the school community and the wider world community. We nurture and support one another's emotional and social development and respect and celebrate our differences.

Respectful

Our school community holds respect at the core of all we do; we consider carefully the consequence of our actions and words, mindful of the impact these may have on others. We celebrate the progress and effort of those around us.

Ambitious

We strive to be the best we can in all aspects of life: manners, kindness, effort, work, regardless of our starting points, disability, ethnicity, faith or culture. We are all capable.

Care should be taken to give each child the opportunity to learn about the global community, regardless of race, Religion, language, gender or economic status.

Our aim is that no child should be advantaged or disadvantaged due to their race, religion, language, gender or economic status.

Pupils with learning difficulties can be given greater access to the whole curriculum through the use of Computing. They are able to improve the accuracy and presentation of their work and this can improve their motivation and raise self-esteem. A variety of software and tools have been sourced to support this work. Where necessary, pupils are given additional support to provide access to the curriculum. Specialist software and hardware is made available for pupils with specific difficulties, for example, roller ball mice for pupils with co-ordination problems, magnification software for pupils with sight problems and software to support pupils with developing numeracy and literacy skills. Computing is used to provide additional activities to extend and challenge gifted and talented pupils.

Aims

- To ensure that the school provides a wide range of flexible resources to support learning and teaching in Computing and across the curriculum
- To improve children's capability in the use of Computing.
- To extend and enhance learning across the curriculum.
- To enable children and staff to select and use Computing tools appropriately and efficiently and apply their use across a range of subject areas
- To ensure continuity and progression throughout the primary phase and towards secondary education.
- To deliver the Computing National Curriculum.
- To enable the children to appreciate the importance of Computing in their lives and some of the purposes for which it can be used.
- To develop awareness of the benefits of using the internet and an understanding of how to use it safely.
- To reduce staff workload through use of Computing to support management and administration.

<u>National Curriculum content</u>

Key stage 1

Pupils should be taught to:
- understand what algorithms are, how they are implemented as programs on digital devices, and that programs execute by following precise and unambiguous instructions
- create and debug simple programs
- use logical reasoning to predict the behaviour of simple programs
- use technology purposefully to create, organise, store, manipulate and retrieve digital content
- recognise common uses of information technology beyond school
- use technology safely and respectfully, keeping personal information private; identify where to go for help and support when they have concerns about content or contact on the internet or other online technologies

Key stage 2

Pupils should be taught to:
- design, write and debug programs that accomplish specific goals, including controlling or simulating physical systems; solve problems by decomposing them into smaller parts
- use sequence, selection, and repetition in programs; work with variables and various forms of input and output
- use logical reasoning to explain how some simple algorithms work and to detect and correct errors in algorithms and programs
- understand computer networks, including the internet; how they can provide multiple services, such as the World Wide Web, and the opportunities they offer for communication and collaboration
- use search technologies effectively, appreciate how results are selected and ranked, and be discerning in evaluating digital content
- select, use and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems and content that accomplish given goals, including collecting, analysing, evaluating and presenting data and information
- use technology safely, respectfully and responsibly; recognise acceptable/unacceptable behaviour; identify a range of ways to report concerns about content and contact

<u>**Opportunities for Personal, Health and Social Responsibility Education**</u>
Use opportunities within lessons to promote the UN convention on the Rights of the Child. Other examples could be: e-safety, exercise, relationships, food hygiene.

<u>**Resources Provision**</u>
Classes have access to a variety of Computing equipment depending on the age and experience of the children. All classes have one multimedia computer with Internet access linked to an LCD screen for whole class teaching. All classes have one timetabled slot in the computer suite, which is used for discrete teaching of the Computing curriculum with additional times being available for booking in the mornings. A class set of i-pads is available in mobile trolleys, which allow teachers to use Computing in the classroom to support cross- curricular learning. Key Stage 1 classes have access to 'Roamers'.
All teachers have a school laptop, which is used for planning, preparation and assessment. There is a whiteboard in the computer suite. All computers are linked to the internet and to the school network in order to facilitate access to resources.

<u>**Use of software**</u>
A range of age-appropriate software is available to support all strands of the Computing curriculum:
- Multimedia
- Programming
- E-Safety
- Handling Data
- Technology in Our Lives 🔲

Software to support other curriculum areas is the responsibility of that Subject Lead and is purchased through their budget. Software licences are kept centrally, with the School Business Manager and are checked when changes to hardware provision are made or when software is purchased.
New software and hardware is regularly purchased and introduced in accordance with the school Computing plan. The resource allocation for Computing is planned through discussions involving staff and governors in order to ensure that the school keeps pace with the rapid changes in Computing.

<u>**Health and safety**</u>
- Children are taught to act safely when using computing equipment in terms of use of plugs, wires and keeping liquids away from electrical items. E-safety is integrated into every computing lesson; please read 'E-safety Policy'.

Assessment, record keeping and reporting

- Children's work is either kept in school or photographed.
- Judgements are made against National Curriculum expectations and the school ROLO.
- Teachers use formative assessments to provide immediate feedback to children to ensure good progress.
- Teachers use formative assessments to inform planning.
- Teachers make summative assessments half-termly using ongoing formative assessment, subject-specific tests, and work scrutiny against the school record of learning observation (ROLO) document. Judgements are recorded on the school Progress Tracker.
- Children's progress in computing is reported to parents through the pupil annual report and work is shown to parents at a termly 'book look'.

Developing and Monitoring the Computing Curriculum

Role	Responsibility
The Role of Senior Management	The overall responsibility for the use of Computing rests with the senior management of a school. The Head, in consultation with governors and staff: • determines the ways Computing should support, enrich and extend the curriculum; • decides the provision and allocation of resources; • decides ways in which developments can be assessed, and records maintained; • ensures that Computing is used in a way to achieve the aims and objectives of the school; • ensures that there is a Computing policy, and identifies the Computing Lead.
The Role of the Computing Lead	The designated lead should: • ensure the development of an effective Computing Curriculum. • promote, support and monitor the use of Computing across the curriculum; • manage the provision and deployment of resources • coordinate the evaluation and review of the school's Computing policy. • There is a clear distinction between teaching about Computing and teaching with Computing.

The Role of The Teacher	Even though whole school co-ordination and support is essential to the development of Computing capability, it remains the responsibility of each teacher to plan appropriate Computing activities and assist the Computing Lead in the monitoring and recording of pupil progress in Computing.