Computing and Information Technology Policy

Hale CEVC Primary School

Policy written – April 2020

To be reviewed – April 2022

Purpose of Computing

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.

At Hale Primary School, we believe that computing is an integral part of preparing children to live in a world where technology is continuously and rapidly evolving, so much so that children are being prepared to work with technology that doesn't even exist yet. With technology playing such a significant role in society today, we believe 'Computational thinking' is a skill children must be taught to enable them to participate effectively and safely in our digital world. A high-quality computing education equips pupils to use creativity to understand and change the world. Computing is sometimes taught discreetly but with it having strong links with mathematics, science, and design and technology it is often taught as part of a cross curriculum topic. The heart of computing is Computer Science in which pupils are introduced to a wide range of technology, including computers, iPads and interactive whiteboards, allowing them to continually practice and improve the skills they learn. Foundation stage and lower Key Stage One have access to iPads daily through continuous provision opportunities. The exposure to technology helps to ensure children become digitally literate allowing them to express themselves and develop their ideas through information and computer technology. We aim to teach high quality computing lessons which spark curiosity, imagination and allow the children to learn from their mistakes through 'debugging' which promotes resilience.

The National Curriculum of teaching and learning divides Computing into three strands

- Computer Science
- Digital Literacy
- Information Technology

It is therefore important that children recognise the difference between what makes each one relevant to their future, as well as their everyday lives. High quality teaching of Computing, from Reception through to Year 6, utilises a combination of practical lessons and unplugged activities designed to promote discussion and nurture

understanding, which are also relevant to other areas of the curriculum such as PSHE and Citizenship. It sets out a framework within which teaching and non-teaching staff can operate and give guidance on planning, teaching and assessment. This policy should be read in conjunction with the Computing scheme of work that sets out in detail what children in different year groups will be taught.

Aims set out in the National Curriculum

Computer Science

• To enable children to become confident coders on a range of devices.

• To create opportunities for collaborative and independent learning.

To develop children's understanding of technology and how it is constantly evolving.

Digital Literacy

• To enable a safe computing environment through appropriate computing behaviours.

• To allow children to explore a range of digital devices.

• To promote pupils' spiritual, moral, social and cultural development.

Information Technology

• To develop ICT as a cross-curricular tool for learning and progression.

• To promote learning through the development of thinking skills.

• To enable children to understand and appreciate their place in the modern world

British Values within Computing At Hale Primary School

Democracy

- Listening to everyone's ideas in order to form a majority.
- Working as part of a team and collaborating to use computing devices effectively.
- E-Safety meeting and notes are taken to inform next actions

Rule of Law

- Developing knowledge of lawful computing behaviours – online safety
- Demonstrating respect for computing laws and online image
- Respecting themselves and others online

Individual Liberty

- Taking responsibility for our own computing behaviours.

- Challenging stereotypes and bias.
- Exercising rights and personal freedoms safely through knowledge of E-safety.
- Knowledge how to report an E-Safety concern

Respect and Tolerance

- Showing respect for other cultures when undertaking research using computing devices.
- Providing opportunities for pupils of all backgrounds to achieve in computing.
- Respecting yourself and others online

Our Computing objectives at Hale School

In order to fulfil the National Curriculum requirements and to develop children's understanding of Computing and ICT skills we will provide the following:

- Within all classrooms Computing will be taught through computer science, information technology and digital literacy.
- Continuity throughout the school by using Knowlsey SOW to ensure that experience and skills are developed in a cohesive, progressive and in consistent way.
- Access to computers and Ipads within class or in the computer suite
- Experience of a variety of well-planned, structured and progressive activities.
- Experience cross-curricular links to widen children's knowledge of the capability of computing including safe use of the Internet and other digital equipment.
- Opportunities for children to recognize the value of computing and ICT in their everyday lives and their future working life as active participants in a digital world.

Current resource provision

- The school has 46 iPads, 30 are situated in a locked trolley which can be moved to different areas of the school. The other 16 iPads are based in the Reception/Year One area.
- In the computer suite we have 16 computers.
- Each machine has internet access and applications used in Computing lessons.
- Each Teacher has a machine in their classroom. Reception class has 1 pupil machine and Year One have 2 pupil machines.
- The Knowsley CLC Computing scheme has been purchased and training is to be arranged
- Each teacher has a school iPad including the bursar and head teacher which can be taken off site.
- each teacher has a school laptop which can be taken off site

- Reception, Year 1 and Year 2 have generic log in details to access the server, pupils in Key Stage 2 have personal log in details
- After school club have a generic log in account to be used when children are in after school club.
- Halton Borough Council oversee the site. Each fortnight a technician visits school to attend to any issues, update machines or install software.

There are Interactive Whiteboards (IWBs) in every classroom, used throughout the day for whole class teaching in all subjects. Whiteboards are also used within group activities by teachers or TAs or for collaborative activities by pupils. Whiteboards are also regularly used by pupils themselves to participate in the class or group lesson, or demonstrate what they have learned or to display work they have done. The IWB is connected to a main classroom computer/laptop which is on the school network with access to shared work areas. Pupils and teachers can share work from an Ipad using Air server.

Home links

The children have access to a wide variety of resources that enable them to continue their learning of Computing and technology at home. For example; Active Learn and Mathletics. Through these the children are able to complete set tasks, and save their work virtually so that it can be shared both in school and at home with teachers and parents. We have Class Dojo pages for each class. Parents from each class are invited to access posts, photographs and videos for their child's class. We do not use the personal message facility unless stated eg during lockdown (April 20) Twitter will be used from September 2020 to update parents and celebrate work. We also use Parent share to send out text messages.

Equal Opportunities, Inclusion, Special Educational Needs and Disabilities (SEND)

All children should have access to the use of computing technologies regardless of gender, race, cultural background or physical or sensory disability.
We aim to respond to children needs and overcome potential barriers for individuals and groups of children by:
• Ensuring that all children follow the scheme of learning for Computing with support where needed
• Providing curriculum materials and programmes, which are in no way class, gender or racially prejudice or biased.
• Providing opportunities for our children who do not have access at home to use the school computers/Internet to develop independent learning.

- Providing suitable challenges for more able children, as well as support for those who have emerging needs.
- Responding to the diversity of children's social, cultural and ethnographical backgrounds.
- Overcoming barriers to learning through the use of assessment and additional support.
- Communication or language difficulties by developing computing skills through the use of all their individual senses and strengths.
- Movement or physical difficulties by developing computing skills through utilising their individual strengths.
- Behavioural or emotional difficulties (including stress and trauma) by developing the understanding and management of their own learning behaviours.
  - Accessibility features on iPads to be used where necessary eg larger text, change of background colour, voice commands and predictive text.

Assessment and record keeping

- On-going formative assessment is an integral part of good practice. Its main purpose is to enable the teacher to match work to the abilities and needs of the children and ensure progression in learning.
- Seesaw – every member of staff has had Seesaw training by either Alan Ellis from Knowlsey CLC or Rebecca Ford our Computing subject leader. Classes each have a QR code, which enables pupils to scan using an iPad and upload work, which is sent directly to their class teacher. Work is then saved in personal folders and can be reviewed by teachers or for monitoring.
- Teachers record progress against national curriculum objectives at the end of each topic
- Children self-assessment against learning objectives
- Training to be provided by Knowlsey CLC
- Children have personal log in details to save work on the school network

Health and Safety

The school takes very seriously and is aware of the health and safety issues surrounding children's use of ICT. We ensure that pupils have a safe environment in which to learn.

School devices have Smoothwall filters to help safeguard the pupils. This is managed by Halton Borough Council and reports are sent to the head teacher.

- All electrical appliances in school are tested by a LA approved contractor every twelve months.

- Damaged equipment is reported to the school business manager who will arrange for repair or disposal.
- E-safety is discretely taught each term by class teachers (using Knowsley CLC)
- ESafety officers meet with the subject leader every half term and the officer then give out any key messages,
- Children learn about rights and responsibilities when using the Internet.
- Each month parents are sent an E-Safety Newsletter
- Every term teachers are sent a termly newsletter with current affairs
- There is also a link on our school website to direct parents to further information on how to keep children safe online (CEOP)

Security, legislation and data protection

We keep children and staff safe by using the following;
- The school ICT technician (HBC) is responsible for regularly updating anti-virus software.
- The use of ICT and computing will be in line with the school's Acceptable Use Policy (AUP).
- All staff must read and sign the Acceptable Use Policy.
- At the beginning of each year, parents and children are given a copy of an Acceptable Use Policy for parents and pupils which must be read and signed.
- All children are aware of the school rules for responsible when logging onto a computer
- Reminders for safe and responsible use of ICT and computing and the Internet are given to children by staff and E-Safety officers
- Software/apps installed onto the school network server must have been vetted by the teacher for suitable educational content before being purchased and installed. No personal software is to be loaded onto school computers other than for educational purposes eg DVD for a topic. Further information can be found in the school's Data Protection policy.

Internet Safety

Internet access is planned to enrich and extend learning activities across the curriculum. However, we have acknowledged the need to ensure that all pupils are responsible and safe users of the Internet and other communication technologies both in school and outside. We celebrate Safer Internet day each year but in Hale we recognise the importance of being safe online every day and that everyone is responsible for keeping children safe when using technology. We have 2 E-Safety officers that meet with the Computing co-ordinator every month, minutes are taken and the children cascade key messages to all classes.

At present, the school endeavours to deny access to social networking and online gaming websites to pupils and staff within the school. All pupils are advised to not given out any information to others online and should tell an adult immediately if they are unhappy about a situation. Pupils are taught to avoid putting images of themselves (or details within images that could give background details eg school uniform) If staff or pupils discover an unsuitable site, the screen should be switched off (younger children click on the sticker which is the minimise button). This should be reported to the e-safety coordinator and should be logged in the e-safety log book situated in the staffroom.

A parental newsletter for online safety is sent home every month and staff are sent termly updates. Parents have been sent a document about setting parental controls (April 2020)

Roles and Responsibilities

The head teacher, in consultation with the ICT leader and staff will:
- Determine the ways in which Computing and ICT supports, enriches and extends the curriculum.
- Create an action plan which will be continually reviewed throughout the year
- Decide on the provision and allocation of resources and the need for new resources
- Ensure that Computing and ICT is used in a way that achieves the aims and objectives of the school.

There is a designated Computing subject leader to oversee the planning and delivery of Computing and ICT within the school through:

Facilitating the use of ICT across the curriculum in collaboration with all subject leaders.

Providing or organising training to keep staff skills and knowledge up to date.

Advising colleagues about effective teaching strategies, managing equipment and purchasing resources.

Monitoring the delivery of the Computing and ICT curriculum and reporting to the head teacher and governors.

Ensuring all National Curriculum statutory requirements are being met with regard to the use of ICT within curriculum subjects.

Whole school coordination and support is essential to the development of Computing and ICT curriculum however, it is the responsibility of each individual teacher to plan

and teach appropriate Computing and ICT activities and assist the leader in the monitoring and recording of pupil progress in the subjects.

Monitoring

Monitoring enables the subject leader to gain an overview of Computing and ICT teaching and learning throughout the school from Reception to Year 6. This will assist the school in the self-evaluation process identifying areas of strength as well as those for development, which can be actioned in the action plan. In monitoring the quality of Computing and ICT teaching and learning, the subject leader will:
• Observe teaching and learning in the classroom.
• Have discussions with teachers and children.
• Look at children's work
• Check plans to ensure full coverage of the Computing and cross-curricular ICT requirements

Training

Staff confidence and expertise will be developed if requested through training sessions provided by the Computing Co-ordinator, and external agencies. The subject leader keeps a log of internal and external training. Support will be given, where possible, with Computing planning and teaching by the Computing co-ordinator and support from Knowsley CLC.