Maple Primary School

Information Communication and Technology/ Computing Policy 2015

Our values and aims

In line with the aims of Maple School, we plan to:

- Develop children's competence, independence and skills in and through Computing.
- Observe the requirements of the programmes of study of the National Curriculum (NC) and the Rising Stars scheme of work for computing.
- Make children aware of the applications of computing in everyday life and to recognise that the equipment in school is a valuable resource to assist them in their own learning and development of skills.
- Encourage children to make choices about their use of computing and how they can use it to present their learning.
- Develop the use of computing to enhance teaching and learning across the curriculum.
- Meet the needs of all children in each year group and to make maximum possible use of resources.
- Enable and equip the children to learn, control and explore their own ideas and re-present their learning across the curriculum.
- To equip all children with the experiences and skills of computing that they will use in a rapidly changing technological world. Including the use of social media.
- To enable all children to work with purpose and enjoyment

Our Objectives

Children's Learning

We believe that the use of computing in the school context can be powerful in motivating children, increasing independence in learning and providing unique learning experiences. In the classroom, teachers plan for the direct experiences laid out in the NC programmes of study and the Early Learning Goals and provide the opportunities for children to explore the computer systems and control technology of everyday life.

Our specific objectives are:

- To give children opportunities to use equipment that provides them with choices and a means to organise, record, communicate and understand the effects of those choices (including the Internet, digital cameras, iPads and film).
- To allow children to create, save, retrieve and present ideas using pictures, symbols, words and sound.
- To develop basic keyboard skills to facilitate the efficient use of equipment.
- To enable children to collect, sort and classify information on a topic and to present their work well for themselves and others.
- To widen children's learning opportunities through offering the unique experiences available in simulations, decision-making games and the interrogation of data bases.
- To develop e-mail communications and Internet research facilities
- To give children opportunities to use computing across the curriculum and to include computing based activities in all subject areas, as appropriate.
- Children, parents, staff, governors and the wide community have relevant and meaningful experiences. Twitter is used across the school.
- Children have a growing awareness of how computing is used in the world around them and of the benefits that it provides.
- To allow children to develop skills in programming and control software.

ICT and the Foundation Stage

In the Foundation Stage, we aim to stimulate and encourage children's interest in computing by providing children with opportunities to identify and discuss the use of technology around them, in a variety of settings. Children have access to a range of computer based resources within the classroom environment, where they can practise the simple skills of using equipment. For example:

- Playing/rewinding cassettes in tape recorders and CD players
- Controlling remote control toys or programmable floor robots.
- Using digital cameras.
- Exploring the use of simple programs on classroom computers
- Developing mouse and keyboard awareness
- Using simple programs on iPads

Children are given opportunities to gather information using CD-ROMs, audio and visual reference materials and, with adult encouragement, to develop an understanding of the value of using reference materials to follow up questions/find new information. Talking books can be used to help develop early reading skills and Paint programs are used to help develop early mark making skills. These are also used as invaluable resources for topic links, e.g. art based investigations. The language and vocabulary associated with ICT equipment, e.g. "rewind", "double-click", is developed through conversations with adults in the classroom and around the school. Role-playing the use of computing in a wider context of the world around them is modelled for them and children are encouraged to explore this further.

Planning for computing is topic based and integrated into the different areas of the Early Learning Goals, as appropriate. The Rising Star scheme for Foundation stage is used to guide this.

Key Stage 1

In Key Stage 1, we aim to help children develop their abilities to apply computing skills across the curriculum. Children work with a variety of equipment (e.g. cameras, computers, iPads and floor turtles) and software in order to communicate and handle information, to control devices and explore computer based models and simulations. They will have opportunities to:

- Write words, news reports, stories, poems, create pictures, graphs and tables and then display and print that information.
- Develop basic keyboard and mouse/pointer skills.
- Use Digital cameras and movie makers to present their learning. Including the use of iMovie.
- Have practice in basic number, phonic and reading skills.
- Consolidate knowledge and understanding of computing concepts using software on the school network, laptops and standalone computers.
- Play games to consolidate learning.
- Gain expertise in pattern making.
- Gain experience of control and modelling situation.
- Start to understand the basics of control and programming software (and the accompanying technical vocabulary)
- Have experience of and explore teacher directed websites.
- Apply computing skills across the curriculum.
- Email links.

Key Stage 2

Children work with an increasing range of computing tools in order to communicate and investigate information and to use control devices that monitor and model events. They will have opportunities to:

- Develop keyboard and mouse skills.
- Consolidate knowledge and understanding of computing concepts using software on the school network, laptops and standalone computers.
- Use Digital cameras and movie makers to present their learning. Including iMovie
- Draft and re-draft pieces of writing with increasing proficiency in their use of word processing software

- Present and represent their knowledge and understanding using text, picture, symbols, sound and video.
- Collect, sort, classify, store and retrieve information for themselves and others.
- Apply computing skills across the curriculum.
- Develop their use of colour, pattern, design and illustration.
- Experience decision making scenarios
- Develop their research skills using e-mail and the Internet
- Manage own desktop password and e-mail account in Y5 and Y6.
- Become proficient in the use of control and programming software (e.g. scratch and Sketch up) and the accompanying technical vocabulary.
- Use Skype, as a class, to communicate with schools in other countries.

In all year groups there is a focus on ESafety (see eSafety policy)

Planning

Teachers' long, medium and short term planning follows the NC Programmes of Study, Rising Stars scheme of work and curriculum guidance for the Foundation Stage. Computing is planned for as a separate subject both Key Stage 1 and 2, with cross-curricular approaches identified in short term planning. Subject Coordinators will monitor the use of ICT computing in other subject areas. Computing is either taught as weekly sessions or blocked as Computing days.

We employ a range of organisational methods to deliver the ICT content.
We use:

- Whole class sessions
- Ability and/or mixed ability groups
- Individual work
- Paired work
- Small groups

Differentiation

Teachers plan to meet the needs of all children, including those with specific educational needs in the following way:

- Through the use of designated SEN laptops.
- Setting tasks at the appropriate level for the individual.
- Using software with a range of levels. E.g. Bee-bots – Scratch.
- Directing a child to a specific level of work or specific program.
- Providing open-ended tasks.
- Using specific software in phonics, spelling and logic or decision making scenarios.
- Varying the type or amount of adult input to support or extend.
- Developing 'qwerty' keyboard skills to meet specific needs.
- Being aware of children who do not have access to a computer at home.
- A specialist TA who swaps with other TAs to support in computing lessons.

To ensure Equal Opportunity, teachers organise and plan for computing in the classroom so as to ensure that all children have:

- Equal access to the equipment
- Equitable time on the computers/ iPads/ cameras etc.
- Appropriate tasks and software matched to abilities
- Allow children access to the Internet who may have limited, or no access out of the school environment.

Computing work is planned to challenge children of all abilities. Please see our 'Inclusion' and 'Gifted and Talented' policies.

Assessing, monitoring and reviewing

In order to assess the attainment of individual children in computing we:

- Observe and record interactions during computing activities
- Note children's technical skills
- Evaluate the outcomes of computing work

We monitor the children's progress throughout the year. Informal monitoring takes place during and after each lesson, to inform the content of the next lesson, or skills to be attained. From KS1, children develop an 'online' computing folder where they store their work.

We use the Rising Stars scheme of work. We are currently linking this scheme to the new Herts for Learning Assessment program. Computing 'phases' (no longer levels) are inputted into the Sims tracker programs. Children's individual progress is reported to parents in their annual school reports. All end of Key Stage 2 assessments are sent electronically to receiving secondary schools.

Computing lessons are monitored by the Head teacher and Computing Co-ordinator. Feedback is given and any areas of concern are addressed. The governors are kept informed of the Computing Improvement plan, and encouraged to contribute their ideas for development.

The Computing Co-ordinator has an online file which stores work from 3 children in each class. This is added to regularly by the class teacher. This means that the Computing coordinator and SLT are able to quickly and efficiently monitor progression.

Resources

For information about the equipment in school, location of software, hardware and support materials, see appendix A.

Roles and Responsibilities

The Head Teacher

The overall responsibility for the use of computing lies with the Headteacher.
He consults with staff and Computing Co-ordinator to:-

- Ensure the computing curriculum is adequately resourced by regular funding, following the computing development plan
- Ensure that computing is used in a way that will achieve the aims and objectives of the school
- Monitor the teaching of computing
- Ensure that computing is included in the planning of all subjects
- Provide opportunities for the computing co-ordinator to carry out her responsibilities
- Ensure that there is an computing policy and co-ordinator

The Computing Co-ordinator

The computing co-ordinator will:

- Act as leader in the development of computing within the school
- Write the development plan and update it regularly.
- Monitor and assist in developing the skills base of the whole staff in computing skills.
- Assist in evaluation and assessment
- Have an overview of pupil progress.
- Plan for review in staff meetings and through INSET for all staff.
- Promote the integration within appropriate teaching and learning activities of computing
- Give advice to other subject co-ordinators and class teachers about how they can use computing in their subjects
- Manage the running of the computer Network, with support from the school technicians.
- Develop the role of the technicians
- Review software resources and order, in consultation with technician, colleagues, the head and the advisory service.
- Plan for management, storage and maintenance of resources
- Collate and update information for the school website.
- Along with technicians, liaise with outside agencies e.g. SITTs
- Ensure staff are aware of licensing, and data and copyright legislation.
- Monitor the development of the school website and Twitter accounts, and ensure that these are increasingly informative for parents and children.

Other subject co-ordinators

Other subject co-ordinators should plan where teaching computing fits into their schemes of work. They will also be responsible for monitoring and developing the use of computing in their subjects. The computing co-ordinator will give support and advice if requested, and have an overview of the progress.

Class teachers

- Are responsible for planning appropriate computing activities, including cross curricular opportunities
- Will assist the co-ordinator in monitoring, assessing and recording pupil progress in computing.
- Will regularly update their monitoring folders, photos for the website and Twitter accounts.

Health and Safety

All equipment is checked annually under the Electricity at Work Regulation 1989. An inventory is kept up to date by the technician and administration staff. New equipment is added to the inventory on arrival. Staff have been advised of health and safety guidance relating to Interactive Whiteboards, and should adhere to the guidance on use of this equipment which is displayed around the school. Staff are aware of the main health and safety issues regarding use of equipment with their pupils and notices are displayed around the school.

Data protection and Copyright

All parents are given written information about our internet safety policy and a consent form for their child to appear on the school website. A record is kept in the school office detailing the children who should not be featured. Children and Parents sign a Home-School Agreement in Key Stage 1 and 2 to allow safe, responsible and independent use of the Internet and Herts Grid e-mail facilities. Staff and pupils are informed of the need to seek authors' permission before appropriating images or text from the Internet or printed sources where appropriate. All staff, and pupils in Key Stage 1 and 2, are encouraged to scrutinise web based resources carefully to ensure they can be downloaded. Staff have documentation about public use of copyrighted files.
Copies of software licenses are held in the Head Teacher's filing cabinet and the computing files.

Policy Review

This policy was reviewed in June 2015 and will be reviewed every 3 years, or when:

- A new co-ordinator is appointed
- Any significant changes are made to the National Curriculum
- There are any major changes to the ICT in school

The staff who reviewed this policy are:

Tim Bowen
Val Kemp
Harriet Woodhouse
Veronica Wheen
Fiona Baldwin
Mandy Sykes
Marie Herbert
Julia Bowen
Lindsey Noble
Nan Younger
Rachel De La Croix
Julia Turner
Emma Jacobs
Lauren Hitchcock

The policy has also been reviewed by Governors

Eileen Washington
Martin Cook