

Bleakhouse Primary School

Computing Policy

Vision

All pupils at Bleakhouse have the right to rich learning experiences that balance all the aspects of computing. With technology playing such a significant role in society today, we believe a high-quality computing curriculum provides children with the skills they need to participate effectively and safely in a digital world. We aim to ensure that each child is provided with opportunities to reach their full potential as independent and life-long learners through the development of their knowledge, skills and understanding of computing in the 21st century. We aim to develop flexible learners who can apply their computing capability to different learning situations.

At Bleakhouse Primary, we teach five elements of computing: Online Safety, Information Technology, Computer Science, Multi-Media and Digital Literacy in which pupils are introduced to a wide range of technology allowing them to continually practice and improve the skills they learn. This ensures they become digitally literate so that they are able to express themselves and develop their ideas through information and computer technology.

By the end of their time at Bleakhouse, children should feel confident in using technology and will know how to keep themselves safe online. Children will have a sound knowledge of up to date technology and how it can be used to enhance the curriculum and their learning. This prepares them for the challenge of a rapidly developing and changing technological world. Children will ultimately leave Bleakhouse ready for the future.

Aims

In our school we aim to:

- Ensure all staff and pupils are confident, competent and independent users of computing
- Motivate and inspire pupils and raise standards across the curriculum
- Enable children to independently use a range of computing skills to enhance their work
- Ensure that children's work in computing has continuity and progression
- Demonstrate the uses and impact of computing in the wider world
- Make children aware of inappropriate use of ICT and how to use it safely and responsibly
- Use computing skills specified in the National Curriculum to improve students' knowledge, understanding and capability in computing.
- Provide varied opportunities for pupils to apply and consolidate their computing capability across different curriculum contexts.
- Assess computing systematically with a focus on pupils' skills and future targets.
- Provide opportunities for learning out of school hours and promote links with parents and the wider community.
- Use ICT to support all pupils to ensure they are able to reach their full potential, regardless of gender, disability or ethnicity.
- Take responsibility as staff for our own continuing professional development in the Computing curriculum and ICT.

Implementation of Teaching and Learning

At Bleakhouse Primary School, we follow our progression framework to ensure that all of the children leave Bleakhouse with the skills they need for the future. This progression framework is then used to create planning for each year group which builds on the previous years' skills. This enables children to become advanced in the skills of computing across the five aspects and it also enables teachers to build on prior knowledge. Children must master all of the skills in their year group in order to progress to the next stage - this enables us to keep high standards at Bleakhouse for computing.

We place an emphasis on teaching computational thinking, supporting children to think creatively in order to understand and change the world around them. Our teaching will take into account the many different styles of learning, the computing potential of each learning situation, the differing knowledge and skills of the pupils and the changing technology in school. We will provide opportunities for interactive, hands-on, personalised learning using high quality computing resources as a vehicle to enable and empower pupils to become anytime, anywhere learners in all aspects of the curriculum.

Pupils will have experiences of a variety of software that allows teachers to provide for progression of skills, concepts and applications. Pupils will have the opportunity to work individually, in pairs and in small groups, and will experience the frequent use of computing in their own classrooms. Increasingly, the pupils will become more independent in their use of computing and the choice of software required for any given curriculum activity. This aim should be kept in mind from the earliest contacts pupils have with computers, by informing them clearly why they are using a computer for a particular activity.

Differentiation

Planning ensures that a wide range of strategies are employed in order to differentiate ICT tasks. Examples of these are:

- Same activity but different outcome
- Same theme but different levels of input
- Different pace of working
- Different groupings of pupils

Revision of Teaching and Learning

The Computing Lead reviews teachers' computing plans to ensure full coverage of the Computing National Curriculum requirements and to monitor the range of both teaching styles and resources that are employed to develop computing capability.

This policy needs to be read in conjunction with the Teaching, Learning and Assessment Policy.

Computing and the Wider Curriculum

Computing has deep links with the wider curriculum including mathematics, science, and design and technology. Here at Bleakhouse Primary we believe that computing can enhance our learning and teaching in the wider curriculum and so we try to use computing in as many subjects as possible. By allowing technology to be used across the curriculum, children can see the benefits of becoming computer literate for the future. By implementing computing this way, we also enable the children to show how creative they can be; children may create an animation using Pivot Animator in art, use Microsoft Word to present their finished writing or explain how something works in science by using Chatterpix. Ultimately, we are trying to implement computing not only into our computing lessons, but across every aspect of our curriculum at Bleakhouse.

Assessment

Our computing curriculum is planned to demonstrate progression. If children are keeping up with the curriculum, they are deemed to be making good or better progress. We use our Progression Framework in KS1 and KS2 to keep track of children's learning. We can monitor progress in all five elements of computing by highlighting the skills the children have mastered. This also enables us to plan interventions or clubs to support those children who are not meeting their year group standards. Similarly, assessment enables teachers to recognise children who are excelling in computing. This allows teachers to introduce children to their next stage of learning.

In addition, we measure the impact of our curriculum through the following methods:

- A reflection on standards achieved against the planned outcomes
- Children can understand and apply the fundamental principles and concepts of computer science, including abstraction, logic, algorithms and data representation;

- Children can analyse problems in computational terms, and have repeated practical experience of writing computer programs in order to solve such problems;
- Children can evaluate and apply information technology
- Children are responsible, competent, confident and creative users of information and communication technology.
- Pupil discussions about their learning

Roles and responsibility

There is a designated Computing Lead who oversees computing planning within the school. It is the responsibility of the Computing Lead to:

- Provide guidance and support to colleagues when implementing the curriculum plan, and also to keep abreast of current developments in hardware, software and the National Curriculum.
- Monitor and evaluate children's learning by using a variety of strategies which include: observing lessons, looking at children's work, displays around school, talking to staff and children, having access to termly and weekly planning and scrutinising teacher's formative assessment. Through the monitoring and evaluating of lessons the Computing Lead will ensure consistency of approach to the teaching of computing throughout the school.

Equality Policy

At Bleakhouse Primary School we are committed to equality of opportunity for all children, parents/guardians, staff, governors and visitors. We aim to ensure that no-one is discriminated against on the grounds of race, sex, disability, colour, nationality, ethnic or national origins, marital status, sexual orientation, age, trade union activity, political or religious belief.

For further details see the Equality Policy.

Resource Management:

Technical

Any faults with the computing equipment are reported to the ICT technician. The technician will endeavour to respond on his/her next visit to the school.

Hardware

Laptops for computing lessons are stored in the school's Learning Hub. In addition, each year group has their own set of laptops and iPads for classroom use. The following resources are available for staff to use: digital cameras, iPads and laptops for staff use at home. All computers are password protected for the relevant user groups. The Business Manager and ICT technician set up user names and passwords.

Software

The Computing Lead, with the ICT technician, is responsible for ensuring that the automatic updating of anti-virus software is operating efficiently by checking at least monthly. New software is purchased only after evaluation, whenever possible, to ensure that it fits the purpose for which it is intended and that it is non-discriminatory. Licences are kept by the Business Manager.

Security

The school has an alarm system installed throughout. The notebus trolleys are locked when not in use and made secure at night. Computing equipment is all security marked with the school postcode. Each computer system is accessed through a password system providing security against unauthorised access to the management system. The school promotes the security of data held in line with the Data Protection Act and the General Data Protection Regulation (GDPR) requirements from 25th May 2018.

Health and Safety

All pupils receive introductory sessions on the correct use of the computing trolleys dealing with Health and Safety issues. The Site Manager or, on occasion, children will move the trolleys around school. Children are not permitted to plug the sockets into the walls.

Lessons involving the use of computing should be structured to ensure that there are periodic breaks where pupils' attention is directed away from the screen to a distant object such as the teacher or interactive whiteboard. Computers located in classrooms are positioned, wherever possible, away from light reflection and glare. The optimum position is at right angles to the natural source of light.

Management Information systems

By developing its use of electronic Management Information Systems (MIS), the school saves teachers' time, whilst providing effective electronic availability of individual pupil tracking data, both within school and at transfer at the end of Key Stage.

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