Preesall Fleetwood's Charity CE School Computing Policy

Our School Vision Statement

'You are the light of the world. A school built on a hill cannot be hidden.'
Matthew 5:14 (adapted)

We will do our best, be kind, share ourselves with our community and shine from our hill, out into the world. At Fleetwood's Charity, we create a happy caring environment based on Christian Values, where we value every child and encourage them to strive for their highest standards of achievement. We ensure that our young people go into the world as confident, independent, responsible citizens with a love for learning.

Our Vision Statement pays homage to our belief that there is something potentially wonderful in each individual, and that this is something to be proud of and share with others.

Computing Policy

Introduction

At Fleetwood's Charity CE Primary School, we are committed to providing all children with learning opportunities to engage in Computing. This policy reflects our values and philosophy in relation to the teaching and learning of Computing. It sets out a framework within which teaching and non-teaching staff can work, and gives guidance on planning, teaching and assessment.

This policy should be read in conjunction with the Online Safety Policy, the Social Media Policy and the Acceptable Use of IT Policy.

Intent

We believe that an engaging and motivating Computing curriculum will enable our learners to:

- Use computational thinking and creativity to understand and change the world.
- Make deep links with mathematics, science and design and technology.
- Build knowledge of principles of information and computation, how digital systems work, and how to put this knowledge to use through programming.
- Become digitally literate – able to use, express themselves and develop ideas through information and communication technology.

Aims:

- Computational thinking – the ability to solve problems in a creative, logical and collaborative way – is developed through repeated programming opportunities and opportunities to build understanding and apply the concepts of computer science.
- Pupils become responsible, competent, confident and creative users of information and communication technology.
- Pupils have a growing awareness of how technology is used in the world around them and of the benefits that it provides. They are supported to evaluate and use information technology, including new or unfamiliar technologies.
- Opportunities for communication and collaboration develop understanding of the purposes for using technology and these are used to bring together home and school learning experiences.
- Technology is used imaginatively to engage all learners and widen their learning opportunities,
- Pupils have access to a variety of devices and resources and are encouraged to reflect on the choices they make to use them.
- We expect our pupils to:
  - Develop computing skills, knowledge and understanding
  - Develop an understanding of the wider applications of computer systems and communication technology in society
  - Develop independent and logical thinking through reasoning, decision making and problem solving
  - Develop imagination and creativity
  - Work independently and collaboratively

Implementation
Curriculum and progression:

Early Years:

- Pupils build confidence to use technology purposefully to support their learning for all Early Learning Goals as appropriate.
- Pupils in Foundation Stage class will have experiences using technology indoors, outdoors and through role play in both child-initiated and teacher-directed time.
- The Foundation Stage teacher uses the Somerset Continuous provision map to plan for technology in a range of contexts.

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.

Cross-curricular links

Computing contributes to teaching and learning in all curriculum areas.
For example, graphics work links in closely with work in art, and work using databases supports work in mathematics, while the Internet proves very useful for research in humanities subjects.
Information technology enables children to present their information and conclusions in the most appropriate way.

English
- Information technology is a major contributor to the teaching of English.
- Through the development of keyboard skills and the use of computers, children learn how to edit and revise text.
- They have the opportunity to develop their writing skills by communicating with people over the Internet.
- They learn how to improve the presentation of their work by using presentational or publishing software.

Maths
- Many Information technology activities build upon the mathematical skills of the children. Children use information technology in mathematics to collect data, make predictions, analyse results, and present information graphically.
- They also acquire measuring techniques involving positive and negative numbers, and including decimal places.

Personal, social and health education (PSHE) and citizenship
- Information technology makes a contribution to the teaching of PSHE and citizenship as children learn to work together in a collaborative manner.
- They develop a sense of global citizenship by using the Internet and e-mail.
- Through the discussion of moral issues related to electronic communication, children develop a view about the use and misuse of technology, and they also gain a knowledge and understanding of the interdependence of people around the world.

SMSC

Computing and ICT contributes to our children's SMSC development through:
- Preparing the children for the challenges of living and learning in a technologically enriched, increasingly interconnected world.
- Making clear the guidelines about the ethical use of the internet and how we keep ourselves and others safe e.g. discussing the moral and social implications of cyber-bullying.
- Acknowledging advances in technology and appreciation for human achievement.

Planning

- Planning for Computing is implemented using two core documents: the National Curriculum Programme of Study for Computing 2014 and the Statutory Framework for Early Years Foundation Stage.
- Long term planning has been developed using the Lancashire Planning Document and Purple Mash Scheme of Work. It is adapted to the needs of the school.
- Key skills in information technology are developed through Multimedia and Handling Data threads and are integrated into learning in other curriculum areas.
- E-safety is taught through the Computing Curriculum, as well as through PHSE.
- Opportunities for technology as a tool to support learning and teaching in all areas of the curriculum are identified in teachers' curriculum planning.

Online safety:

- A progressive online safety curriculum ensures that all pupils are able to develop skills to keep them safe online.
- Opportunities for learning about online safety are also part of the PSHE curriculum and reinforced whenever technology is used.
- At the beginning of every year pupils sign an acceptable use of IT agreement. The class rules regarding online safety and acceptable use of IT are shared with pupils and parents. Advice for keeping pupils safe online at home is shared with parents and displayed on the school website.
- The school supports the international Safer Internet Day each February and provides opportunities for pupils to consider cyberbullying as part of Anti-Bullying week in the autumn term.
- Opportunities are taken whenever possible to reinforce messages of a healthy life style.
- The school has an online safety policy in place that details how the principles of online safety will be promoted and monitored.
- Staff receive training linked to online safety.

Equal opportunities:

- The school maintains its policy of equal opportunities as appropriate for Computing.
- Computers and related technology are made available to all pupils regardless of gender, race or abilities.
- The class teacher differentiates work by task, resource or support, to ensure the individual needs of more able and SEN pupils are met.
- The school is aware that not all pupils have the same access to computers at home and this is considered by staff in the planning and delivery of the curriculum.

Resources:

- The school has a range of resources to support the delivery of the Computing curriculum, the Early Years Framework and learning across all areas of the National curriculum. We maintain a list of resources used in each phase.
- Online tools such as Purple Mash are part of the experience of pupils.

Health and safety:
- Age appropriate class and safety rules are displayed in the learning environment.
- Equipment is maintained to meet agreed safety standards.
- From Foundation Stage upwards, pupils are taught to respect and care for technology equipment.
- Further guidance can be found in the school's health and safety policy.

Impact

Assessment:
- Progress is assessed on an on-going basis using the school's 'I can' statements for each area of Computing. This ensures teachers are aware of individual pupil's progress in computer science, information technology and digital literacy.
- Self and formative assessment is used by the class teacher and teaching assistant during whole class or group teaching. Children's confidence and difficulties are observed and use to inform future planning.
- Each class teacher maintains a record, indicating pupils that are working beyond or below age-expected attainment. This is passed on to the next class teacher.
- Children are aware of the 'I can' statements and are encouraged to set success criteria for their work.
- Open questions are used to challenge children's thinking and learning.
- Children are encouraged to evaluate their own and others' work in a positive and supportive environment, including peer assessment.
- Teacher's judgments are supported through an electronic portfolio of evidence which provides examples of age-expected attainment.
- Information is shared with the school community through the school website, display, celebration events, newsletters, and end of year reports.

Roles and responsibilities:
- The school community works together to ensure the implementation of the Computing and linked policies.
- Subject leaders in other curriculum areas are responsible for recognising the links between computing and English, Mathematics, Science and foundation subjects; and planning to use these to support learning across the school.
- The class teacher is responsible for delivering an effective Computing curriculum and integrating this into their planning for other subject areas where this is appropriate.
- The school receives technical support from St Aidan's Church of England High School and the technician, who visits fortnightly, is responsible for the maintenance of computers, printers, the school network and keeping software up to date. The subject leader liaises with the technician to ensure that the systems are running efficiently.

Role of the subject leader
The subject leader for computing is Mr Wells.

The Subject Leader is responsible for improving standards of teaching and learning in Computing through:
- Monitoring and evaluating Computing
- Provision of high quality Computing through school
- Maintaining the availability of high quality resources
- Maintaining an overview of current trends and developments within the subject
- Identifying professional development needs of staff and planning CPD

The Subject Leader will meet with the link Governor twice a year and report to the Curriculum and Standards sub-committee as required.

Date of policy: 14/6/20

Date of review: 14/6/23