

St Mary's Catholic Primary School



*'With Jesus, we learn together
through faith and love'*

Computing (ICT) Policy

Formulated on: 19th January 2010

Ratified by Governing Committee:

(Chair of Committee)

(Date)

Ratified by Full Governing body:

(Chair of Governors)

(Date)

Date of review: 29th September 2020

Computing (ICT) Vision:

Our Vision

Our Vision at St. Mary's is that technology is used safely to support and extend learning in the classroom and beyond. We aim to use computing to involve parents in their child's education and to provide appropriate information. Technology is used to aid administration and analysis of data across the school.

Technology for learning should:

Involve all learners in the learning process and support pupils in their understanding. Allow pupils to work at their own pace on tasks that are appropriate to their current knowledge and understanding. Provide access to a wide range of high quality resources. Provide a safe learning environment, preventing access to unsuitable material and preventing inappropriate use of technology. Enable learners to track their own progress and set their own targets. Involve parents in their pupils learning informing them of their progress, behaviour and attendance.

Technology for teaching should:

Enable teachers to access a wide range of interactive and digital resources to enrich lessons. Enable teachers to create, use and adapt resources created by themselves and others. Support work planning, assessment and monitoring for groups and individuals. Enable computing and technology to be used in all learning areas across the school. Ensure that all staff are confident in the use of technology. Take into account local and national developments and allow for continuous professional development. Enable teachers to plan for cross-curricular activities that enrich learning.

Technology for management should:

Allow for efficient administrative and financial systems. Provide access to achievement and target-setting data for individuals. Allow data to be analysed effectively to identify individual, group and class targets. Enable the use of assessment data to identify individual and group support and how staff should be deployed. Be secure and integrated with the School's Information Management System. Enable secure transfer of data with other schools, the LEA and children's services. Information should be accessible to all who need to use it including school governors. Allow digital resources to be available to the school community out of school hours.

Rationale (The value of the subject in the child's education):

‘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.’
Computing National Curriculum 2014

Aims

The national curriculum for computing aims to ensure that all pupils:

- can understand and apply the fundamental principles and concepts of computer science, including abstraction, logic, algorithms and data representation
- can analyse problems in computational terms, and have repeated practical experience of writing computer programs in order to solve such problems
- can evaluate and apply information technology, including new or unfamiliar technologies, analytically to solve problems
- are responsible, competent, confident and creative users of information and communication technology

Organisation (How the teaching and learning will be delivered):

Planning

Teachers plan weekly Computing lessons taking learning objectives and lesson ideas from our 'Purple Mash' Scheme of Work. This scheme covers all of the revised National Curriculum Computing Programmes of Study for Key Stages 1 and 2 (2014).

The scheme is broken down into six different themed units of work for each year group and one unit is covered each half term. In their weekly planning teachers adapt the lesson suggestions based on the needs of individual pupils in their class and the computer programs we have in school. All work is differentiated according to need.

Teaching

Every class is timetabled to use the computer suite twice a week. One of these sessions is to teach the Computing programmes of study and the other lesson is to support cross-curricular work. Teachers make use of Interactive Whiteboards in every class to model the use of various programs and applications. Each year group also has the opportunity to request the use of portable laptops and iPads in class.

Resources

A wide range of programs and digital equipment is used to teach the different programmes of study. Every class has a different log-in with year group specific programs available from the desktop. Other resources include digital cameras, iPads, laptops, data loggers/sensors, Bee Bots, Roamers, Lego Control equipment and Roamers.

Cross-Curricular Work

Technology is used to support all areas of the curriculum. It is used in numeracy and numeracy to collect, record, present and analyse data. In DT it is used as a tool for designing and presenting. In teachers planning opportunities are identified for using computing and technology to support learning and teaching.

Online Safety

Opportunities for teaching Online Safety are included in the planning for all year groups. We also hold an Online Safety/Friendship Week each year with a different theme. This includes a theme specific assembly for each year group, follow up work in class, competitions and use of relevant resources and websites. Useful links to parents are included on our website and a parents' workshop offered on the same day.

The Role of the Coordinator:

The role of the Computing co-ordinator includes the following:

- 1) To be responsible for the co-ordination of all Computing work within the school and to raise the profile of the subject throughout the school community.
- 2) To be responsible for writing and publishing a **Subject Policy** in consultation with the SMT, staff and governors.
- 3) Establish a clear, shared understanding of the importance and role of Computing in contributing to pupils' spiritual, moral, social and cultural development.
- 4) To establish, develop and implement a **scheme of work/ long term plan** for the subject in accordance with government requirements and school policy.
- 5) To **monitor and evaluate** the effects of policies and plans (to include monitoring of planning, teaching, assessments, pupil work and perceptions).
- 6) Use data effectively to identify pupils who are underachieving and, where necessary, create and implement effective plans of action to support those pupils, (report information to management and where applicable to other staff members).
- 7) To use monitoring and evaluations to inform future developments and use analysis to write an **Action Plan**, and report and share outcomes to the Governors.
- 8) To establish, maintain and develop appropriate **resources** within the confines of the school budget.
- 9) To attend external **INSET** courses and be involved in the planning/provision of school based INSET.
- 10) To liaise with other schools and agencies to ensure an **up-to-date knowledge** of subject developments.
- 11) To promote **parental interest and understanding**.
- 12) To **support colleagues** in planning, teaching and assessing the curriculum area and providing good models of practice.
- 13) Maintain a subject coordinators file organised as according to the school's format.
- 14) To co-ordinate and monitor the work of the Hgfl computer technician.

Assessment and record keeping:

Teachers evaluate the progress of individual pupils every Computing lesson. On their planning they identify those children working towards and beyond learning objectives. The outcomes of this formative assessment are used to plan future support, consolidation and challenge.

Every half term (at the end of a unit of work) teachers update an APP style assessment sheet for Computing. This is used at the end of the year to identify a level for each child. These results are tracked and analysed using our Target Tracker assessment program.

Each Computing lesson, teachers evaluate and record those children **working towards** or **beyond** a particular learning objective.

Reporting to parents takes place termly at our Parent Consultation Evenings and a Pupil Progress Report (including progress in Computing) is sent home annually.

Inclusion:

Setting suitable challenges

Teachers differentiate most Computing tasks and set high expectations for every pupil during lessons. They plan stretching work for pupils whose attainment is significantly above the expected standard and plan lessons for pupils who have low levels of prior attainment or come from disadvantaged backgrounds. Teachers use assessment for learning strategies to set targets which are deliberately ambitious.

Responding to pupils' needs and overcoming potential barriers for individuals and groups of pupils

Teachers take account of their duties under equal opportunities legislation that covers race, disability, sex, religion or belief, sexual orientation, pregnancy and maternity, and gender reassignment.

Computing lessons are planned to ensure that there are no barriers to every pupil achieving. Pupils are given access to specialist equipment and different approaches as required.

Teachers plan Computing lessons so that pupils with disabilities can access the learning. Potential areas of difficulty are identified and addressed at the outset of work.

Teachers take account of the needs of pupils whose first language is not English. Monitoring of progress takes account of the pupil's age, length of time in this country, previous educational experience and ability in other languages.

Teachers plan teaching opportunities to help EAL pupils develop their English and provide the support pupils need to take part in Computing lessons.

Equal Opportunities:

We are committed to treat every person with equality of esteem and the respect and dignity due to a child of God.

At St Mary's we believe that all human beings are equal in the eyes of God regardless of their race, gender, disability, religion, belief or age. Due to this we aim to ensure that all members of our school have equal opportunities to learn, develop and grow with dignity in a community of mutual respect. We are committed to valuing and celebrating the diversity within our community.

(Please see Diversity and Equality Policy)