Computing Summary – Intent, Implementation and Impact

Intent

At St Augustine's the computing curriculum is designed to equip children for life in the digital world. Throughout the curriculum, computing changes and evolves probably more quickly than any other subject. New technologies be it phone or computer software, developments in Artificial Intelligence and our children's ability to use and manage these technologies sometimes astounds the adults in their lives. This is why E-Safety and being aware of how to be a responsible citizen online is an important feature of the computing curriculum taught here at St Augustine's Catholic Primary School.

We want to develop pupil's appreciation around technology and help them to see the opportunities that a technological world can offer: to use technology to be creative, manage and organise data and collaborate with others on projects. St Augustine's strives that all children upon finishing the end of KS2 will be digitally competent and have a range of transferrable skills to take into secondary school and beyond.

Implementation

The National Curriculum purpose of study states:

'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.'

St Augustine's Catholic Primary School is using the Kapow Primary scheme of work to deliver the National curriculum for Computing. The scheme is split into three main strands: computer science, information technology and digital literacy. Within these three strands there are five key areas, which create a cyclical route through which the pupils develop their computing knowledge and skills. This is achieved through building on each year's previous learning.

The five key areas are:

- Computing systems and networks

- Programming
- Creating media
- Data handling
- Online safety

Using the Kapow Primary Computing scheme of work ensures a broad and balanced coverage of the National Curriculum requirements. Within the scheme, there are some units (Skill's showcase) that have been created to link to other subjects, such as science, art and music. This enables pupils to develop further transferable skills through cross-curricular learning. A range of teaching strategies are used to aid progress. These might include independent tasks, paired and group work, unplugged and digital activities. This variety means that lessons are always engaging and appeal to all types of learning styles. Within the planning, differentiated guidance is available for every lesson ensuring that teachers can cater successfully, with opportunities to stretch pupils' learning and also to support learners who are just becoming confident with their computing knowledge.

Computing is timetabled for one lesson a week at St Augustine's. The school has Chrome book trolleys with enough resources for every child to allow access to the lesson. As seen above, online safety is an important part of the computing curriculum and is embedded within the Kapow Primary Computing scheme. In addition, online safety is also taught through our PSHE/RHE curriculum and during Internet Safety week.

Impact

Both formative and summative assessment opportunities are built into the Kapow Primary Computing scheme of learning. Each lesson has learning objectives to support the teacher in assessing pupils, whilst each unit has a unit quiz and a knowledge catcher which can be used at the start and/or end of the unit to gain an overall understanding of the progress the pupil has made during the unit.

After the implementation of the Kapow Primary Computing scheme, pupils should leave school with a range of skills to enable them to succeed in their secondary education and the ever-developing digital world.

It is expected that children will be able to:

- Know that technology can be used to help them express their ideas and creativity by using software and hardware to achieve their artistic and practical aims.
- Use technology to play a part individually and work collaboratively as a team.
- Understand how to balance time spent on technology and time spent away from it in a healthy and appropriate manner.
- Know how to be critical thinkers so that they can make informed digital choices in the future.
- Have an awareness of developments in technology and how different technologies relate to one another.
- Understand the importance that computing will have going forward in their lives. This will be both in their educational and working lives and also in their social/personal future.
- Know how to behave in a responsible and appropriate manner online and be aware of online safety issues and protocols.
- Show progression of skills in all three strands of the National Curriculum Computing Curriculum – computer science, information technology and digital literacy.