The Avenue Primary School

Computing Policy



Policy Lead	David Joy
Date	November 2021
Review date	November 2022



Introduction

This policy sets out The Avenue's aims and strategies for the successful delivery of Computing. This policy should be read in conjunction with other relevant school policies such as the Safeguarding, Equal Opportunities, Curriculum, Finance, Teaching & Learning, SEND and Assessment policies. The policy has been developed by the Computing Leader (Mr D Joy) in consultation with the school's SLT.

This policy is based on government recommended/statutory programmes of study. Due to the fast pace of technology innovation and constantly emerging trends, it is recommended that this policy is reviewed, at minimum, at the start of every academic cycle.

<u>Aims</u>

The Avenue believes that every child should have the right to a curriculum that champions excellence; supporting pupils in achieving to the very best of their abilities. We understand the immense value technology plays not only in supporting the Computing and whole-school curriculum but overall in the day-to-day life of our school. We believe that technology can provide: enhanced collaborative learning opportunities; better engagement of pupils; easier access to rich content; support conceptual understanding of new concepts and can support the needs of all our pupils.

Our aims:

- Provide an exciting, rich, relevant and challenging Computing curriculum for all pupils.
- Teach pupils to become responsible, respectful and competent users of data, information and communication technology.
- Provide technology solutions for forging better home and school links.
- Enthuse and equip children with the capability to use technology throughout their lives.
- Teach pupils to understand the importance of governance and legislation regarding how information is used, stored, created, retrieved, shared and manipulated.
- Utilise computational thinking beyond the Computing curriculum.
- Give children access to a variety of high quality hardware, software and unplugged resources.
- Equip pupils with skills, strategies and knowledge that will enable them to reap the benefits of the online world, whilst being able to minimise risk to themselves or others.
- Exceed the minimum government recommended/statutory guidance for programmes of study for Computing and other related legislative guidance (online safety).
- Instil critical thinking, reflective learning and a 'can do' attitude for all our pupils, particularly when engaging with technology and its associated resources.
- Use technology imaginatively and creatively to inspire and engage all pupils, as well
 as using it to be more efficient in the tasks associated with running an effective
 school.

Safeguarding: Online safety

Online safety has a high profile at The Avenue for all stakeholders. We ensure this profile is maintained and that pupil needs are met by the following:

- A relevant up-to-date online safety curriculum which is progressive from Early Years to the end of Year 6.
- Through our home/school links and communication channels, parents are kept up to date with relevant online safety matters, policies and agreements.
- They know who to contact at school if they have concerns.
- Data policies which stipulate how we keep confidential information secure.
- A curriculum that is threaded throughout other curriculums and embedded in the dayto-day lives of our pupils.
- Pupils, parents and staff have Acceptable Use Policies which are signed and copies are freely available.
- Training for staff and governors which is relevant to their needs and ultimately positively impacts on the pupils.
- Our E-safety policy (part of our safeguarding policy) clearly states how monitoring of online safety is undertaken and any incidents/infringements to it are dealt with.
- Scheduled pupil voice sessions and learning walks steer changes and inform training needs.
- Filtering and monitoring systems for all our online access, monitored by staff and OneIT.

<u>Curriculum</u>

As a school, we have chosen the Purple Mash Computing Scheme of Work from Reception to Year 6.

The scheme of work supports our teachers in delivering fun and engaging lessons which help to raise standards and allow all pupils to achieve to their full potential. We are confident that the scheme of work more than adequately meets the national vision for Computing.

It provides immense flexibility, strong cross-curricular links and integrates perfectly with the 2Simple Computing Assessment Tool. Furthermore, it gives excellent supporting material for less confident teachers.

Early Years

We aim to provide our pupils with a broad, play-based experience of Computing in a range of contexts. We believe the following:

- Recording devices can support children to develop their communication skills. This is especially useful for children who have English as an additional language.
- Early Years learning environments should feature ICT scenarios based on experience in the real world, such as in role play.
- Pupils gain confidence, control and language skills through opportunities to 'paint' on the interactive board/devices or control remotely operated toys.
- Outdoor exploration is an important aspect, supported by ICT toys such as metal detectors, controllable traffic lights and walkie-talkie sets.

Key Stage 1 outcomes

- Understand what algorithms are, how they are implemented as programs on digital devices, and that programs execute by following a sequence of instructions.
- Write and test simple programs.
- Organise, store, manipulate and retrieve data in a range of digital formats.
- Communicate safely and respectfully online, keeping personal information private, and recognise common uses of information technology beyond school.

Key Stage 2 outcomes

- Design and write programs that accomplish specific goals, including controlling or simulating physical systems; solve problems by decomposing them into smaller parts.
- Describe how Internet search engines find and store data; use search engines effectively; be discerning in evaluating digital content; respect individuals and intellectual property; use technology responsibly, securely and safely.
- Use sequence, selection and repetition in programs; work with variables and various forms of input and output; generate appropriate inputs and predicted outputs to test programs.
- Select, use and combine a variety of software (including internet services) on a range of digital devices to accomplish given goals, including collecting, analysing, evaluating and presenting data and information.
- Use logical reasoning to explain how a simple algorithm works 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 worldwide web; and the opportunities they offer for communication and collaboration.

Assessment (resume September 2022)

- Pupil attainment is assessed using the 2Simple Computing Assessment Tool for Years 1 to 6. The tool enables staff to accurately identify attainment of pupils through the detailed exemplification it has for each key learning intention.
- Tracking of attainment by using the 2Simple Computing Assessment Tool is used to inform future planning.
- Children are encouraged to self, peer and group assess work in a positive way using online collaborative tools such as 2Blog in Purple Mash.
- Formative assessment is undertaken in Computing and pupils are very much encouraged to be involved in that process. Through using the progression of skills documents and displays from 2Simple, both teachers and pupils can evaluate progress.
- Summative assessment is undertaken by using electronic work samples from children's portfolios on Purple Mash. Teachers enter judgements about the samples into the 2Simple Computing Assessment Tool.

Resources

- All resources are procured with the underlining considerations of value: The extent at which the resource impacts on learning and the material cost of this.
- Protocol details for procurement can be found in the Trust finance policy.

- The Computing Leader keeps up to date with the latest technology resources and will make informed decisions about possible procurement of them through their own research.
- A range of resources is available which successfully supports delivering the Computing curriculum and enables all learners to reach their full potential.
- Suggestions for getting the very best out of the resources are made available to teaching and support staff by the Computing Leader.
- Resources are suitably maintained and replenished when needed, which is overseen by the Computing Leader.
- An itemised list of all resources is shared with staff and kept up to date by the Computing Leader.
- The Computing Action Plan details foreseen future resource procurement which is shared with senior leaders before the budget setting period.

Inclusion

At The Avenue, we aim to enable all children to achieve to their full potential. This includes children of all abilities, social and cultural backgrounds, those with disabilities, EAL speakers and children on SEN support or with an EHCP. We place particular emphasis on the flexibility technology brings to allowing pupils to access learning opportunities, particularly pupils with SEN and disabilities. With this in mind, we will ensure additional access to technology is provided throughout the school day and in some cases beyond the school day.

Monitoring, Evaluation and Feedback

Monitoring standards of teaching and learning within Computing is the primary responsibility of the Computing Leader. All teachers are expected to keep an online portfolio or track children's work using Purple Mash assessment tools. Details of monitoring and evaluation schedules can be found in the Computing Action Plan and School Monitoring Schedule)Resume September 2022)

Monitoring will be achieved through:

- Work scrutiny
- Learning walks
- Observations
- Pupil voice
- Teacher voice
- Reflective teacher feedback
- Learning environment monitoring
- Dedicated Computing Leader and Assessment Leader time

Evaluation and Feedback will be achieved through:

- Dedicated Computing Leader and Assessment Leader time.
- Using recognised standards documentation for end-of-year expectations.
- Using recognised national standards for benchmarking Computing provision in primary schools.
- Written feedback on evaluation of monitoring activities to be provided by the Computing Leader in a timely manner.

• Feedback on whole school areas of development in regard to Computing to be fed back through CPD/staff meetings/Governor meetings.

Roles and Responsibilities

Due to technology extending beyond the National Curriculum for Computing, there are key roles and responsibilities specific members of staff have.

Head Teacher

- Monitoring the implementation of the Computing Policy and its associated policies such as the Safeguarding and SEND Policies.
- Ratifying (in conjunction with the Governing Body) the Computing policy, Safeguarding policy and Computing Leader's Action Plan.
- Securing technical support service contracts and infrastructure maintenance contracts.
- Approving CPD and training which is in line with the whole school's strategic plan.
- Approving budget bids and setting them.
- Creating in conjunction with the Computing Leader, a long-term vision for Computing which includes forecasted expenditure and resources.
- Monitoring the performance of the Computing Leader in respect to their specific job role description for Computing.
- Ensuring any government legislation is being met.

Computing Leader

- Raising the profile of Computing for all stakeholders.
- Monitoring the standards of Computing and feeding back to staff in a timely fashion so they can act on areas for development.
- Ensuring assessment systems are in place for Computing (Sep 2022).
- Maintaining overall consistency in standards of Computing across the school.
- Reporting on Computing at specific times of the year to the Governing Body/Head/Staff.
- Auditing the needs of the staff in terms of training/CPD.
- Actively supporting staff with their day-to-day practice.
- Seeking out opportunities to inspire staff in developing their practice through modelling and sharing new ideas, approaches and initiatives.
- Attending training and keeping abreast with the latest educational technology initiatives. Using nationally recognised standards to benchmark Computing.
- Creating bids for the annual budgets and monitoring budget spend.
- Keeping an up-to-date log of all resources available to staff.
- Procuring physical and online resources that demonstrate best value.
- Reviewing the Computing curriculum and developing it as needed.
- Overseeing the effectiveness of the technician.
- Working as needed with the SENCO/Head Teacher to ensure online safety provision is above adequate and all legislation is in place.
- Creating Action Plans for Computing and supporting a long-term vision which feeds into the whole school development plan.

Technician

- Conducts routine scheduled maintenance/updates on systems.
- Supports the administration and set-up of online services including the school website.
- Fixes errors/issues with hardware and software set-up, prioritising as needed.
- Routinely checks school filtering, monitoring and virus protection.
- Maintains network connectivity and stability.
- Sets up new hardware and installations.
- Supports the Computing Leader and Head Teacher with future infrastructure needs and associated projected costs.

Identified staff

- Maintains the school website content.
- Posts approved requests to the school's social media accounts.
- Supports procurement of resources and technical services.
- Supports the technician with some data management.

Health and Safety

The Avenue takes all necessary measures to ensure both staff and pupils are aware of the importance of health and safety.