Randlay Primary School and Nursery

Computing Policy 2026-2027

Our whole school Computing Intent.

At Randlay Primary School & Nursery, we aim to prepare our children for a rapidly changing world through the use of computer technology. Our vision is for all children, whatever their ability, age, gender or race, to develop their technological understanding and skills across a wide range of curriculum areas. Through a safe and confident approach to Computing and ICT, children are given the opportunity to embed the six core values of respect, creativity, collaboration, aspiration, courage and excellence, on a regular basis. We ensure that the delivery of the Computing curriculum helps to develop confident, creative and independent learners, equipping them with effective and transferable life skills. We enable them to find, explore, analyse, exchange and present information. A high-quality computing education equips pupils to use computational thinking and creativity to understand and change the world. In our school, computing has deep links with mathematics, science, and design and technology. The core of computing is computer science, in which pupils are taught the principles of information and calculation, 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 – they are able to use, and express themselves and develop their ideas through, information and communication technology, to aid them in their future workplace and this digital world.

Curriculum Implementation.

The teaching and implementation of the Computing Curriculum is based on the National Curriculum, ensuring a well-structured approach to the subject which covers the three main aspects of Computing; computer science, information technology and digital literacy. At Randlay Primary School & Nursery we make Computing a fun, vibrant and engaging learning experience. As a school we believe it is important to keep up to date with the technological changes that go on in the world. Our aim is to give children the skills that will allow them to thrive in the modern world. Our creative curriculum approach allows children to engage with the National Curriculum objectives in a range of ways using a variety of tools including iPads, laptops and desktop computers. Children's learning is carefully planned using Kapow, ensuring that skills are taught at an appropriate age and are being built on each term and year. A two-yearly cycle is followed to ensure progression is made from year group to year group.

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.

Children in the Early Years use BeeBots and other physical devices to create and execute simple algorithms. This is built on in Key Stage 1 where children learn to write and debug more complex algorithms using physical devices as well as coding software. In Key Stage 2 children develop this further by using a range of software to write their own computer programmes. We recognise that all classes have children with widely differing ICT abilities. This is especially true when some children have access to ICT equipment at home, while others do not. We provide suitable learning opportunities for all children by matching the challenge of the task to the ability and experience of the child. Subscribing to TTRS, Numbots and Mathsframe, provides maths home learning to those children that can access it, yet allowing those who do not have access, opportunities within the school day.

At Randlay we:

- Set common tasks which are open-ended and can have a variety of responses.
- Set tasks of increasing difficulty (not all children complete all tasks).
- Group children by ability in the room and setting different tasks to each ability

group.

- Allow the more able children to act as computer buddies to support those children who need it.

Computing in Early Years:

There is no longer a specific Technology ELG. The old "*Technology*" Early Learning Goal was **removed** in the 2021 EYFS reforms. Children are **not assessed** against a technology-specific ELG anymore. Instead, computing-related skills now sit within broader areas of learning, especially:

Understanding the World

- Recognise that technology is used for different purposes
- Explore digital devices
- Understand the world through digital media (photos, videos, maps, simple research tools)

Communication and Language

- Recognise that technology is used for different purposes
- Explore digital devices
- Understand the world through digital media (photos, videos, maps, simple research tools)

Expressive Arts and Design

- Use digital tools to create pictures, music or stories
- Explore creative apps
- Use technology to enhance role-play (e.g., scanners, tills, keyboards)

Personal, Social and Emotional Development (for online safety foundations)

- Learn early online safety rules
- Know to ask for help if something worries them
- Begin to understand respectful use of devices

Here at Randlay Primary School, Computing in EYFS is **practical, exploratory and play-based**, focusing on early digital literacy and computational thinking.Children learn through:

- **Exploring technology** such as iPads, interactive whiteboards, cameras, Beebots and simple programmable toys
- **Developing early computational thinking** (pattern spotting, sequencing, predicting, problem-solving)
- **Using digital tools** to take photos, record sound, draw, or explore age-appropriate apps
- **Understanding cause and effect** (pressing buttons, giving simple instructions, predicting outcomes)
- **Beginning online safety awareness** — knowing who can help them, understanding "safe adults", recognising feelings when something online doesn't feel right.

These experiences build the foundations for KS1 Computing.

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 part of PSHE and reinforced whenever technology is used.
- Clear rules for online safety are agreed by each class at the beginning of every year. Parents and pupils sign an acceptable user policy together when a pupil first starts at the school. The class rules are then signed annually by pupils and shared with parents.
- Kapow scheme is used for progression and coverage from EYFS to Year 6
- The school supports the Safer Internet Day each February and provides opportunities for pupils to consider cyberbullying as part of Anti-Bullying week in the autumn term.
- Whole school assemblies run by the Computing co-ordinator take place during this time.
- Opportunities are taken whenever possible to reinforce messages of a healthy life style.
- **The school has a detailed, separate Online Safety Policy** in place that details how the principles of online safety will be promoted and monitored.

Artificial Intelligence (AI) Awareness and Education.

As AI becomes increasingly present in everyday life, Randlay Primary School is committed to ensuring pupils develop a safe, age-appropriate understanding of **artificial intelligence**. Our aim is to prepare pupils to interact with AI confidently, critically and responsibly.

Pupils will learn to:

- Understand what AI is in simple, age-appropriate terms.
- Recognise everyday examples of AI (e.g., voice assistants, translation tools, recommendation systems).
- Explore how AI can support learning, creativity and problem-solving.
- Understand that AI systems can make mistakes and require human oversight.
- Develop critical thinking when evaluating AI-generated content, including recognising **misinformation** and bias.
- Understand the importance of fairness, privacy and responsible data use.
- Recognise the difference between human and machine decision-making.

AI awareness will be embedded across:

- **Computing lessons** – exploring simple machine learning concepts, pattern recognition and how computers "learn".
- **Digital literacy** – evaluating AI-generated information and understanding reliability.
- **Online safety** – recognising AI-generated images, videos and text; understanding risks of deepfakes and misinformation.
- **Cross-curricular learning** – using AI tools to support creativity in writing, art and research while emphasising ethical use.

Staff will:

- Model responsible and ethical use of AI.
- Use AI tools to enhance teaching and reduce workload where appropriate.
- Ensure AI use aligns with safeguarding, data protection and school policies.
- Engage in ongoing professional development to stay informed about AI developments

Assessment:

- Progress is assessed on an on-going basis using 'I can' statements for each thread of Computing.
- This ensures teachers are aware of individual pupil's progress in computer science, information technology and digital literacy.
- 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 used to inform future planning.
- End of unit assessments take place, linked to the content covered on Kapow.
- 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, Twitter, computing display, newsletters, sharing assemblies and end of year reports.

Monitoring:

The impact of the Computing curriculum is monitored regularly by the Computing subject lead through pupil voice, samples of work identified in the Digital Daries and discussion with teachers.

- Systematic monitoring of all threads of Computing informs the subject leader and school development plan.
- The Computing lead conducts regular audits of the training needs of teachers and teaching assistants to improve their subject knowledge and confidence. Requests for training in Computing can be part of individual teacher's performance management plan.

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 SEND 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:

- ✓ Desktop computers
- ✓ A class set of laptops stored in two trollies
- ✓ Ipads – each teacher also has their own ipad
- ✓ Beebots
- ✓ Ozobots
- ✓ BBC Micro:bits
- ✓ Interactive whiteboards in every class
- ✓ Cameras

The Computing subject lead keeps up to date with new technologies and reviews the school's provision, as well as maintaining the existing resources in partnership with neighbouring schools. Hardware and software faults are logged to our Technician from Roartech.

Roles and responsibilities:

- The school community works together to ensure the implementation of the Computing policy.
- The subject leader is responsible for monitoring curriculum coverage and the impact of learning and teaching; and assists colleagues in its implementation.
- 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 support from Roartech with a technician on site weekly, who 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.

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, pupils are taught to respect and care for technology equipment.
- Further guidance can be found in the school's health and safety policy. Review:
- This policy will be reviewed biennially by the Computing subject leader and leadership team and shared with the school community.

Review: This policy will be reviewed biennially by the Computing Subject Leader and leadership team and shared with the school community. Date to be reviewed – Summer 2027.