# Grange Infant School
# Computing Policy

**Rationale**

At Grange Infant School, we believe that computing is a key skill that underpins learning across the curriculum and for everyday life. Technology is a part of children's lives, the use of computers, tablets, programmable robots and digital cameras are all tools that can be used to acquire, organise, store, manipulate, interpret, communicate and present information. Children need a structured and progressive approach to learning the skills needed to use these tools effectively and safely.

**Aims**

- Provide a relevant, challenging and enjoyable curriculum for computing for all pupils.
- Meet the requirements of the National Curriculum programmes of study for computing.
- To equip pupils with the confidence and capability to use computing throughout their life.
- To enhance learning in other areas of the curriculum using computing.
- To develop the understanding of how to use computing safely and responsibly.

**Provision:**

**Early years**

It is important in the foundation stage to give children a broad, play-based experience of computing in a range of contexts, including outdoor play. Computing is not just about computers. Early years learning environments should feature scenarios based on experience of technology in the real world, such as in role play. Children gain confidence, control and language skills through opportunities to explore using non-computer-based resources such as library scanners, toy tills and walkie-talkie sets. Recording devices can support children to develop their communication skills. This is particularly useful with children who have English as an additional language. Children will have opportunities to interact with touch screens for games that extend their learning in maths and English.

**Key Stage 1:**

By the end of 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 to create, organise, store, manipulate and retrieve digital content
- Recognise common uses of information technology beyond the school
- Use technology safely and respectfully online, keeping personal information private, identify where to go for help and support when they have concerns about content or contact the Internet or other online technologies

The provision of Computing will be delivered through units of work that build on skills from previous units. The units will focus on computing and programming, digital literacy and e-safety. Computing will use a variety of methods and not solely based on using a computer or device. Some elements will be taught 'offline' to help children see the wider use of technology. E-safety will be taught directly in its own unit but also indirectly through all computing units as well as PHSE.

Computing and programming:

This will focus on teaching children about algorithms and debugging. Children will use programmable robots and move to more abstract methods such as Scratch Jr to create programs and to learn how to debug them. They will be taught to work logically and understand the need to have precise instructions.

Digital literacy:
Children will be taught to create, store and manipulate digital media through the use of art programs and different presentation and publication programs. Children will learn basic skills such as saving files, inserting text and pictures and how to retrieve saved media. They will be taught to find information on the internet and how to use that in their publications. Children will use digital devices to take photos and videos. These units may be cross-curricular where the skills of computing enhance the other curriculum, for example data handling in maths.

E-safety:
Children will learn to keep themselves safe online through focussed lessons as well as underpinning lessons in computing where they are using the internet. They will learn to keep private information safe, not to talk to strangers or meet up with them and to talk to grown-ups if there is a problem. The school will also use the Safer Internet Day to reinforce keeping safe online.

**SEN**
Differentiation in terms of tasks, teaching methods and resources will be planned for pupils with special educational needs. All pupils should have access to materials and opportunities suitable to their specific needs. Where necessary, adaptations will be made and specialist equipment provided to enable all children to access the curriculum.

**Assessment and record keeping**
Teachers regularly assess capability through observations and looking at completed work. Key objectives to be assessed are taken from the national curriculum to assess key computing skills each term. Assessing computing work is an integral part of teaching and learning and central to good practice. As assessment is part of the learning process it is essential that pupils are closely involved.
Assessment can be broken down into:

- Formative assessments which are carried out during and following short focused tasks and activities. They provide pupils and teaching staff the opportunity to reflect on their learning in the context of the agreed success criteria. This feeds into planning for the next lesson or activity.
- Summative assessment should review pupils' capability and provide a best fit. Use of independent open-ended tasks, provide opportunities for pupils to demonstrate capability in relation to the term's work. There should be an opportunity for pupil review and identification of next steps. Summative assessment should be recorded for all pupils – showing whether the pupils are below, within or secure in the learning objectives.
- Use of Floor books to record work and revisit learning

**Health & Safety**
In addition to the school's Health and Safety policy

- All fixed electrical appliances in school are PAT tested. Staff should not bring their own electrical equipment in to school but if this is necessary, then the equipment must be PAT tested before being used in school.

- Damaged equipment should be reported to the technician or business manager who will arrange for repair or disposal.
- Children should be supervised when using plug sockets.
- Children should be supervised when accessing the internet and closely guided to appropriate sites. The school has a filtering system in place but children should not be working unsupervised.
- Trailing leads should be made safe behind the equipment.
- Liquids and foods must not be taken near the computers.
- E-safety forms an integral part of the curriculum and the school will deliver further education through assemblies termly and parent presentations. Further information for parents will be available on the school website

This policy should also be read in conjunction with the school's acceptable use policy and E-Safety policy.

Completion Date: January 2026

Review Date: September 2028