

# Computing in Early Years

At Malvern Wells Primary School



# Computing in Early Years

## 1. Introduction

An overview of what computing is like in early years and where to find it in the curriculum

## 2. Child-Initiated Learning

Key indicators and examples of effective practice when monitoring computing in the early years, in relation to child-initiated learning through an enabling environment

## 3. Adult-Led Learning

Key indicators of effective practice when monitoring computing in the early years, in relation to adult-led learning

## 4. Skills Progression

Guidance on developing a progressive computing curriculum from early years and into KS1



“

We need to help (children) make sense of this world, as well as planting the seeds for their understanding of the implications of technology in their lives and society. This is the start of ‘digital literacy’ and it extends into Key Stage 1.”

Emma Goto, CAS

# Introduction

Computing provides young children with the opportunity to learn skills

which prepare them for the technological world we live in.



**1.**

**Computing in Early Years will be taught through a combination of a well-planned learning environment alongside the teaching of specific computing skills delivered through playful adult-led activities.**

**2.**

**Technology under the EYFS Reforms (September 2021) is no longer a statutory element within the learning and development requirements of the EYFS Framework. However, due regard should be given to the skills children will need to develop in EYFS to enable them to access the computing curriculum in KS1.**

# EYFS Computing -Early Learning Goals and Educational Programmes

No specific ELGs directly link to the KS1 Computing Curriculum

Being able to recognise, create and describe patterns as part of Mathematics is fundamental to later computing skills

Being able to follow instructions involving several ideas or actions as part of Communication and Language is fundamental to later computing skills.

Being able to talk about ways to keep themselves safe as part of Personal, Social and Emotional Development are a precursor to E-Safety themes in KS1.

Other key skills across the EYFS curriculum which support Computing include: fine motor skills; being able to retrieve and understand information from non-fiction sources

## 2. Child-Initiated Learning

Key indicators and examples of effective practice when monitoring computing in the early years, in relation to child-initiated learning through an enabling environment



# An Enabling Environment for Computing -Role Play

- Using technology within play, e.g. phone, computer, keyboard, till, camera, mouse



# An Enabling Environment for Computing -Investigation Station

- Using microscopes
- Taking photographs
- Printing photographs
- Using binoculars
- Researching using a tablet to find information
- Sorting items by classified groups



# An Enabling Environment for Computing -Carpet

- Using tablets
- Using programmable toys, e.g. beebot.
- Operating and exploring own electronic journal
- Playing online games on interactive whiteboard/screen



# An Enabling Environment for Computing -Outdoors

- Using a camera/tablet to take photographs
- Using binoculars to look at wildlife
- Using tablets to record videos and watch then back
- Researching on the internet to find information



# Adults Scaffolding Learning During Child-Initiated Activities

What should I see adults doing?

- Observing children and responding to their fascinations
- Responding to their ideas and suggestions
- Suggesting possibilities to extend their thinking
- Offering additional stimulus and resources when appropriate
- Playing alongside children to take learning forwards, suggesting ideas and showing what's possible
- Play alongside, or in small organised groups to model language, correct and/or extend vocabulary
- Sharing their own experiences and making suggestions
- Role modelling thinking aloud and commenting
- Modelling how to use equipment and resources
- Posing questions and/or 'ponderings' to stimulate ideas and add challenge e.g. What could you use instead? I wonder how? Tell me why?
- Using and introducing language and vocabulary linked to key learning

# 3. Adult-Led Learning

Key indicators of effective practice when monitoring computing in the early years, in relation to adult-led learning.



# What should I expect to see when adults leading a computing activity?

- Adults set an intention for learning that is well matched to the developmental stages of the children, building on what children already know and can do and show an interest in.
- Adults guide learning through playful, experiential activities which are presented in imaginative ways, are hands-on and require active participation from the children
- Activities and experiences are as open-ended as possible to allow for children's imagination and active exploration and for them to express their own ideas.
- Activities and experiences are delivered with individual children, small groups of children depending on the activity and the age/developmental stage of the children.
- In Reception, sometimes activities are introduced as a whole class.
- Adults use resources and materials that children are familiar with and have or will have access to in their child-initiated play.
- Adults skillfully interact with the children through open questioning, by modelling thinking aloud and through genuine interest and curiosity.