# Raising Aspirations in Technology in the Early Years

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# The Great Debate!

# The passive, isolating, damaging nature of technology???

# Early Childhood Education Should…..

- be rooted in play (Moyles, 2015; Bird and Edwards, 2015; Palaiologou, 2017)

- support the development of communication (Whorrall and Cabell, 2016) and allow children opportunities to communicate in their own ways (Edwards, Gandini & Forman).

- support the development of creativity and imagination (Eckhoff and Urbach, 2008).

# The focus must be on how the technology is used?



- Playful?
- Imagination?
- Communication?
- Collaboration?
- Creativity?

Educators should encourage playful interactions and exploration of technology (Yelland, 2011).
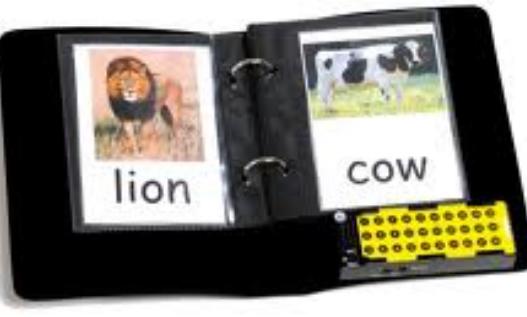
# Statutory Framework for the Early Years – England

Early Learning Goal – Technology:

'Children recognise that a range of technology is used in places such as homes and schools. They select and use technology for particular purposes.'

(DfE, 2014: 12)

# What kind of Technology Should We Use in EYFS?

# Classroom organisation

'Children recognise that a range of technology is used in places such as homes and schools. They select and use technology for particular purposes.'

(DfE, 2014: 12)

Practitioners should develop learning environments that develop and enhance children's play (Palaiologou, 2017).

# Characteristics of Effective Learning
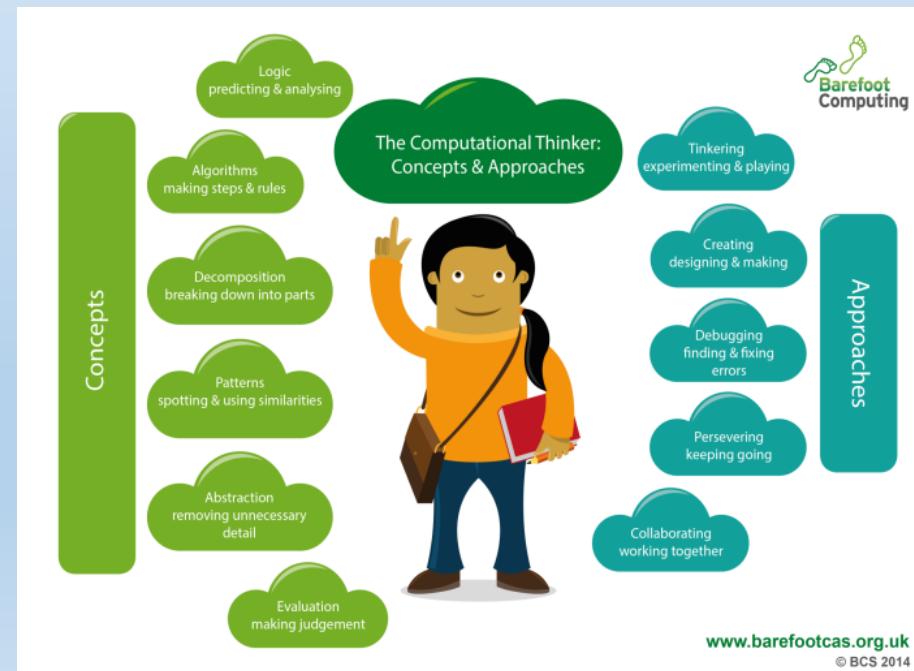
1.9. In planning and guiding children's activities, practitioners must reflect on the different ways that children learn and reflect these in their practice. Three characteristics of effective teaching and learning are:

• **playing and exploring** - children investigate and experience things, and 'have a go';

• **active learning** - children concentrate and keep on trying if they encounter difficulties, and enjoy achievements; and

• **creating and thinking critically** - children have and develop their own ideas, make links between ideas, and develop strategies for doing things.

(DfE, 2014: 9)

# Characteristics of Effective Learning / Approaches to Computational Thinking

- **Playing & exploring** links to **tinkering** & **debugging**
- **Active learning** links to **persevering** & **debugging**
- **Creating & thinking critically** links to **creating** and also the computational thinking concepts of **algorithms, patterns** & **evaluation**

# Support and challenge children to solve problems in their play

## Playing & Exploring / Tinkering & Debugging

Practitioners should:

- Provide open ended experiences.

- Provide a rich stimulating environment that children want to explore.

- Encourage children to engage with the world, get stuck in, try things out.

- Display a positive approach, modelling trial and error when encountering their own challenges.

# Active Learning / Persevering & Debugging

Practitioners should:

- Provide plenty of periods of extended time!
- Provide resources and activities that require lengthy and real concentration.
- In the words of Carol Dweck - Use the word 'yet'
- Celebrate persistence, unsuccessful attempts that move thinking forward and children getting there in the end.

# Creating & Thinking Critically / Creating, Algorithms, Patterns, Evaluation

Practitioners should:

- Encourage children to have their own ideas and try things in different ways.

- Draw links and highlight connections between experiences.

- Encourage children to make predictions and talk about cause and effect.

- Get children to talk about and  plan how to do things.

- Encourage children to review work as they are going along changing strategies as appropriate

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