



Egerton CP School

DESIGN TECHNOLOGY POLICY

Chair of Governors	Steven Skolosdra
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Date approved by governors	16 th November 2023
Date of next review	
Committee Responsible	Curriculum

Intent

At Egerton, we are ambitious for all children to Learn personal, social and academic skills and knowledge, Achieve their potential in all aspects of their lives and Aspire to bright futures both in careers and relationships in the modern world we live in. When children secure a place at our school, we firmly believe that they belong at Egerton, and in belonging here, every child is given the opportunity to succeed.

Our Design and Technology curriculum is carefully designed so that it is inclusive and ambitious for every child to encourage creativity and innovation within the two main themes: Design & Make and Cooking & Nutrition. Our inspiring curriculum is an enhancement of the Design and Technology National Curriculum which prioritises that key knowledge, skills, and cultural capital are embedded into the projects that our children complete while they learn how to take risks and become innovative, resourceful and capable designers as they undertake evaluate past and present design technology and understand its impact on life today. By following the 'Design, Make and Evaluate' process, every child is given the opportunity to learn new knowledge and learn new skills, which are embedded into their long term memories, and work towards designing, making and evaluating their own high-quality products.

Specific DT Design and Make projects aim on developing creative, technical and imaginative thinking in children and to develop confidence to participate successfully in an increasingly technological world while enabling children to talk about how things work and to develop their technical knowledge. Our curriculum allows children to fluently apply a growing body of knowledge, understanding and skills in order to design and make prototypes and products for a wide range of users, and encourage children to select appropriate tools and techniques when making a product, whilst following safe procedures. Children should develop an understanding of technological processes and products, their manufacture and their contribution to our society as they foster enjoyment, satisfaction and purpose in designing and making and evaluating products. Children are given the opportunity and know the importance of critiquing, evaluating and testing their ideas and products, and the work of others in order to improve.

Within Cooking and Nutrition lessons, children should understand and apply the principles of nutrition and to learn how to cook by learning and building on new skills.

In all areas of the Design Technology curriculum, children are introduced to pioneers who have contributed to design and technology today, and who aim to inspire the children in all aspects of their creative learning.

Implementation

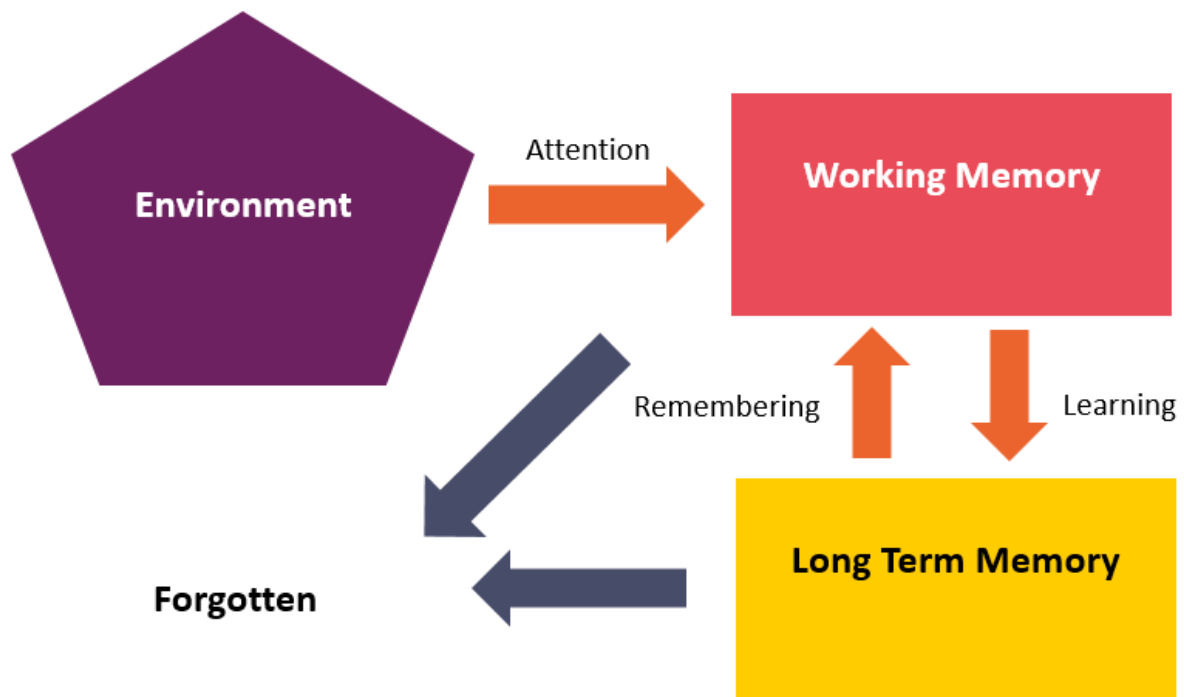
To ensure high standards of teaching and learning in Design and Technology, we implement a curriculum that is progressive throughout the whole school. From the Early Years Foundation Stage to Year Six, our Design and Technology curriculum progressively builds on knowledge and skills towards an end point, ensuring that all children make progress by knowing more, remembering more, and doing more. Each class completes a Design & Make project and a Cooking & Nutrition project. Each specific project ensures that pupils gain valuable knowledge and skills through the 'design, make and evaluate' process, which prepare them for their next year group where projects revisit and build on prior knowledge and skills. As well as this, the curriculum is carefully designed to link with specific learning in other subjects to ensure that pupils are fully immersed in their learning and their vocabulary, knowledge and skills can be applied in a variety of creative ways where risk taking is encouraged, and children face challenges where they must retrieve learnt information from their long term memory.

Within their bespoke projects, our pupils learn about inspiring designers whose products have shaped the world today and who are pioneers in their field. Children are taught the importance of evaluating and problem solving while they endeavour to make their products the best that they can be while applying their knowledge and skills.

We know the impact that inspiring visitors can have on supporting and enhancing children's learning experiences, and we look to provide opportunities, which support children's DT curriculum content at the point of learning.

Long-term memory

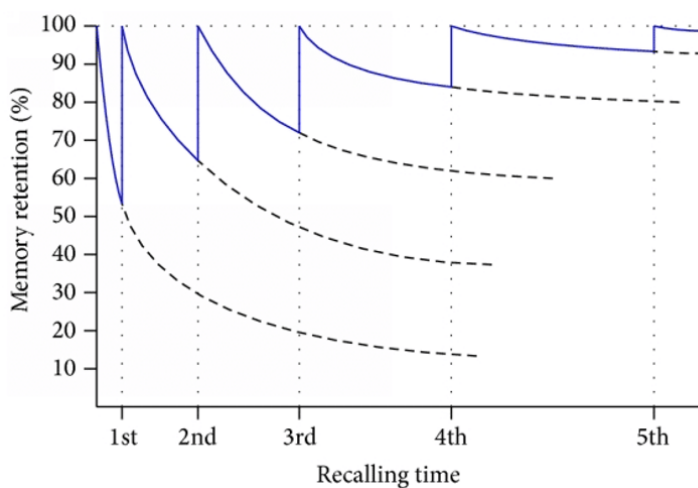
Another key consideration for staff is learning vs performance. Learning is a persistent change in our long-term memory. Learning goes on inside our minds and we cannot see this. Performance is immediate behaviour or knowledge that can be observed and measured. This can be challenging because learning cannot be seen – it is an internal process, and we can only make inferences about learning based on performance. In order for us to invoke lasting changes in pupils' understanding and capabilities, we need to consider an important factor in learning – memory. This has two key elements: working memory and long-term memory.



Willingham's simple model of memory highlights that we only learn what we attend to. We need to orient our attention to what we are learning. Therefore, it is vital that key vocabulary and lesson objectives are visible on the board during physical education lessons.

Once we attend to what we need to learn, it enters our memory. Memory is divided into two parts: working memory and long-term memory. Working memory is the conscious state of where we do our thinking. Long-term memory is where successfully processed information is stored.

We can also forget information that has entered our long-term and short-term memory. Forgetting is not a negative thing as it is an important part of learning.



Key Idea:

After learning something, our memory of it will decline over time unless we retrieve or review it. Therefore, it takes time to strengthen long-term memories.

The Ebbinghaus forgetting curve demonstrates that practice helps us retain memories. Each time we return to something, we are able to relearn that memory both quicker and will retain it for longer. Forgetting and remembering are both crucial in the learning process – ‘practice makes permanent’. In physical education, children are regularly practising and developing skills physically. Therefore, peer and teacher feedback is essential in these skills development, alongside the regular fluency activities during lessons of previously taught skills.

Impact

Due to the well-sequenced and progressive nature of our Design and Technology curriculum, children regularly revisit knowledge and skills and link ideas together to solve problems. Therefore, they know more, can remember more and do more in all subjects across the curriculum.

Within Design and Technology, children take part in the development of tomorrow’s rapidly changing world as they become creative problem-solvers, both as individuals and as part of a team. Through the study of design and technology, children demonstrate practical skills with an understanding of aesthetic, social and environmental issues, as well as of functions and industrial practices. As young designers, the children reflect on and evaluate present and past design and technology, its uses and its impact. Most importantly, our carefully planned sequence of projects inspire children making them excited and passionate about their next design problem to solve.