Five Stones Learning Federation
Curriculum Policy

Adopted: September 2020
Review: September 2021

Vision

"Life in all its fullness"

Our vision guides us in all that we hope to be, enabling every part of our community to grow and develop. This means growing in body, mind and spirit in order to flourish and experience the joy and hope of, 'life in all its fullness' (John 10.10).

Introduction

Design and technology prepares children to take part in the development of tomorrow's rapidly changing world. Creative thinking encourages children to make positive changes to their quality of life. The subject encourages children to become autonomous and creative problem-solvers, both as individuals and as part of a team. It enables them to identify needs and opportunities and to respond by developing ideas, and eventually making products and systems. Through the study of design and technology they combine practical skills with an understanding of aesthetic, social and environmental issues, as well as of functions and industrial practices. This allows them to reflect on and evaluate present and past design and technology, its uses and its impacts. Design and technology helps all children to become discriminating and informed consumers and potential innovators.

Intent

Our DT curriculum intends to develop pupils who are confident and innovative designers, with a wide variety of design skills that they can use across the curriculum and for their own enjoyment.

At Evenwood C of E primary, we believe that learning is a change in long term memory. We believe children learn best by having opportunities to revisit previous learning. We teach DT every term to ensure that the children can fully immerse themselves and have opportunities to reflect and build on prior learning and skills.

The knowledge and skills required to excel in this subject are set out in the DT progression document. This document has been created across the federation by the DT subject leads in partnership with the curriculum lead. Each member of teaching staff has access to the document as a supportive tool when planning in order to review previous learning; ensure a coherent curriculum that outlines essential knowledge and skill development; and as an accurate assessment tool.

At Evenwood C of E Primary School, we want children to:

- develop the creative, technical and practical expertise needed to perform everyday tasks confidently and to participate successfully in an increasingly technological world
- build and apply a repertoire of knowledge, understanding and skills in order to design and make high-quality prototypes and products for a wide range of users
- critique, evaluate and test their ideas and products and the work of others
- understand and apply the principles of nutrition and learn how to cook

Implementation

The school uses a variety of teaching and learning styles in design and technology lessons. Our principal aim is to develop children's knowledge, skills and understanding in design and technology. We ensure that the act of investigating and making something includes exploring and developing ideas, and evaluating and developing work. Teachers ensure that the children apply their knowledge and understanding when developing ideas, planning and making products, and then evaluating them. We do this through a mixture of whole-class teaching and individual or group activities. Within lessons, we give children the opportunity both to work on their own and to collaborate with others, listening to other children's ideas and treating these with respect. They have the opportunity to use a wide range of materials and resources, including ICT.

Design and technology curriculum planning

Our curriculum design is based on principles derived from evidence through cognitive science:

- Learning is most effective with spaced repetition.

- Retrieval of previously learnt content is frequent and regular, which increases both storage and retrieval strength.

In addition to the principles, we also understand that learning is invisible in the short term and that sustained mastery takes time.

Our content is skill/knowledge specific. We make intra-curricular links to strengthen schema

Continuous provision, in the form of daily routines and starters to lessons, provides retrieval practice for previously learnt content.

The long term planning in the Design and Technology sets out when and what component is taught throughout each term. Design and Technology is planned over a two-year cycle to accommodate mixed age group classes. The content is coherently planned to allow for a progressive, well-developed curriculum that builds on skills to develop strong procedural and semantic knowledge, providing a deeper, more sustainable understanding of the curriculum content where children are active in making connections to everyday life and the world they live in.

We carry out the curriculum planning in Design and Technology, in two phases: long-term and medium-term planning. Our long-term plan maps out the knowledge and skills covered in each half-term and the objectives that are to be focussed on during that half-term of teaching. Our subject leader oversees this planning and ensures progression and coverage of skills.

We plan the activities in Design and Technology so that they build on the children's prior learning and giving children ample opportunity to retrieve knowledge from their long term memory. While we give children of all abilities the opportunity to develop their skills, knowledge and understanding, we also plan progression into the scheme of work, so that there is an increasing challenge for the children as they move up through the school.

The Foundation Stage

We encourage the development of skills, knowledge and understanding that help reception children make sense of their world as an integral part of the school's work. As the reception class is part of the Foundation Stage of the National Curriculum, we relate the development of the children's Expressive Arts and Design and Understanding the world to the objectives set out in the Early Learning Goals. These underpin the curriculum planning for children aged three to five. This learning forms the foundations for later work in design and technology. These early experiences include asking questions about how things work, investigating and using a variety of construction kits, materials, tools and products, developing making skills and handling appropriate tools and construction material safely and with increasing control.

We provide a range of experiences that encourage exploration, observation, problem solving, critical thinking and discussion. These activities, indoors and outdoors, attract the children's interest and curiosity.

Impact

The intended impact of our curriculum is that children build knowledge, make connections between this knowledge and use it to explore and create. At this school Design and Technology will be implemented throughout the curriculum, an example of this would be using a 'Big Write' where children can demonstrate their skills and knowledge from their long term memory relating to skills and knowledge key to Design and Technology.

The teaching of Design and Technology offers opportunities to support the social development of our children through the way we expect them to work with each other in lessons. Our groupings allow children to work together, and give them the chance to discuss their ideas and feelings about their own work and the work of others. Through their collaborative and cooperative work across a range of activities and experiences in Design and Technology, the children develop respect for the abilities of other children, and a better understanding of themselves. They also develop a respect for the environment, for their own health and safety, and for that of others. They develop their cultural awareness and understanding, and they learn to appreciate the value of differences and similarities. A variety of experiences teaches them to appreciate that all people are equally important, and that the needs of individuals are not the same as the needs of groups. Design and technology contributes to the teaching of personal, social and health education and citizenship. We encourage the children to develop a sense of responsibility in following safe procedures when making things. They also learn about health and healthy diets. Their work encourages them to be responsible and to set targets to meet deadlines, and they also learn, through their understanding of personal hygiene, how to prevent disease from spreading when working with food.

Information and communication technology enhances the teaching of design and technology, wherever appropriate, in all key stages. Children use software to enhance their skills in designing and making things. Children are given the opportunity to use ICT to control mechanisms and to get them to move in different ways, either in a virtual world or via an infrared connection to working models. The children also use ICT to collect information and to present their designs through a range of design and presentation software.

Assessment for learning

We assess the children's work in Design Technology while observing them working during lessons and this is formally recorded each year against National Curriculum expectations. This information will contribute to the child's annual report to parents. We pass this information on to the next teacher at the end of each year.

Children are encouraged to assess and evaluate both their own work and that of other pupils. This helps them to appreciate how they can improve their performance, and what their targets should be for the future.

Health and safety

In this subject the general teaching requirement for health and safety applies. We teach children how to follow proper procedures for food safety and hygiene. We carefully model the correct use of tools to ensure that children are safe at all times.

Monitoring and review

The monitoring of the standards of children's work and of the quality of teaching in design and technology is the responsibility of the subject leader. The work of the subject leader also involves supporting colleagues in their teaching, being informed about current developments in design and technology, and providing a strategic lead and direction for this subject in the school. The subject leader has specially-allocated time in which to fulfil this role by reviewing samples of children's work and visiting classes to observe teaching in the subject.

This policy will be reviewed at least every two years.