

Design and Technology Programme of study Key Stage 1

Children naturally love making things and, we believe, it is our role to harness that interest and help children make increasingly sophisticated designs. The design tasks children undertake have a clear purpose that links specifically to the outcome of the project.

With real purpose for their designs our children are encouraged and motivated to develop the creative, technical and practical expertise needed to complete the challenge.

In developing their designs children will learn to critique, evaluate and test their ideas and products as well as the work of others. This is done by using children's interests, stimulating their natural curiosity, and challenging them to take risks in their designs. It is made explicit that Design and Technology involves thinking about what products are used for and the requirements of those who use them.

The high quality and ingenuity of children's work is celebrated by providing opportunities for them to share and talk about their designs. This may take the form of a workshop to enable them to share their skills with others, a hungry crowd to taste their delicious recipes, or perhaps an exhibition to show the amazing products they have designed and produced. We feel that this ensures that the children's natural love of making things is always harnessed, developed and celebrated.

Our Curriculum Design and Technology aims to ensure that all pupils:

- 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.

Pupils will be taught to

Design

- design purposeful, functional, appealing products for themselves and other users based on design criteria
- generate, develop, model and communicate their ideas through talking, drawing, templates, mock-ups and, where appropriate, information and communication technology

Make

- select from and use a range of tools and equipment to perform practical tasks
- select from and use a wide range of materials and components, including construction materials, textiles and ingredients, according to their characteristics

Evaluate

- explore and evaluate a range of existing products
- evaluate their ideas and products against design criteria

Technical knowledge

- build structures, exploring how they can be made stronger, stiffer and more stable
- explore and use mechanisms in their products.
- use the basic principles of a healthy and varied diet to prepare dishes
- understand where food comes from.

Progression

- I can design purposeful, functional, appealing products based on design criteria.
- I can generate, develop, model and communicate my ideas through talking, drawing, templates, mock-ups and, where appropriate, information and communication technology.
- I can select from and use a range of tools and equipment to perform practical tasks e.g. cutting, shaping and joining.
- I can select from and use a wide range of materials and components, including construction materials, textiles and ingredients.
- I can select from and use a wide range of materials according to their characteristics.
- I can explore and evaluate existing products.
- I can evaluate my ideas and products against my design criteria.
- I can build structures, exploring how they can be made stronger, stiffer, and more stable.
- I can explore and use mechanisms e.g. levers, sliders, wheels and axles in my products.