Curriculum Booklet

Design and Technology





Why is Design and Technology important?

Why is Design and Technology important at Bredbury St Marks?

Design and Technology in our school develops our children's skills and knowledge in design, structures, mechanisms, electrical control and a range of materials, including food. It encourages children's creativity and encourages them to think about important issues.

Design and Technology helps to teach Maths and English and indeed other compulsory subjects on the curriculum in a fun manner and put these subjects into context making them easier to digest and more understandable to younger primary age pupils.

D&T gives children the opportunity to develop skills, knowledge and understanding of designing and making functional products. We feel it is vital to nurture creativity and innovation through design, and by exploring the designed and made world in which we all live and work.



How is Design and Technology taught?

Blocks of Learning

At Bredbury St Marks we teach design and technology through carefully planned termly blocked sessions. This enables our children to develop their skills and knowledge daily and learning is delivered in a more in depth, more practical, in terms of time and resources intense style. Our children were finding that just as they were beginning to use and apply new knowledge, skills and understanding, they were having to pack up and transfer their thinking and effort to a new curriculum area. This resulted in many consecutive sessions having to recap on what the children had learned the previous week. This slowed the pace of progress for the children and often made learning feel disjointed.

We plan whole school blocks of time to teach Design and Technology so that the children can also make connections between peers and siblings, within the whole school, in regards of skills, knowledge and experiences they are all having at a similar time. Celebrations of work is then collaborated and displayed around the school for all pupils and parents to view. Our children then also see the progression of skills and knowledge they have gained and will be experiencing within their time with us at Bredbury St Marks and have an incentive for learning future projects.



Structure and Planning

Blocks of lessons are carefully planned with a clear structure and process in mind: Researching, designing, creating and evaluating.

Researching: This allows the children to learn about an designers technique or process and to understand how the creativity unfolds. This process gives the children opportunities to be observant, curious, knowledgeable and interested.

Designing: This gives the children an opportunity to design and create their own piece of work based on what they have seen or explored or learnt from an designer. This process allows the pupils to "magpie" ideas, reimagine, develop, respond and explore.

Creating: This is where our pupils can create pieces of their own work and to show case their own creativeness, style and preferences. This process allows our children to experiment, take risks, be creative, imaginative, wonder and make mistakes.

Evaluating: This process can be carried out in a variety of ways. Children can self-evaluate, peer evaluate or group evaluate their own and others work. This process helps the children to understand what they have learnt, changes they may wish to make and plan their next steps in their learning journey as well as reflect, evaluate, discuss, think, understand, connect, discover, realise and share ideas.

2 Year programme

We have planned a 2 year rolling programme to ensure all our pupils access the age related skills and knowledge involved in our Design and Technology curriculum.

Throughout the 2 years the children will learn and explore:

Year A: Food and Structures

Year B: Food and Mechanisms

We choose the designers we study from a range of eras so the children gain knowledge and skills of artists from the past and present day. We also ensure the artists we cover have a variety of skills to model. When children leave our school at the end of Year 6, they will have learnt to make 7 different food dishes and learnt about a variety of structural and mechanical designers.



Assessment of Design and Technology

Assessment are made for the skills and knowledge the children are taught throughout the year.

Class and individual pupil assessments are carried out termly and the Design and Technology lead analyses the data to look for strengths, areas of development or any professional development opportunities. The children are graded to be emerging, developing or secure. Children who are regarded as being exceeding would be acknowledged to the Design and Technology Lead and added to their register.

The feedback you will see in our art sessions is verbal, through discussions with the children about their own work and that of others. Asking a variety of open questions to allow the children to express their feelings and opinions regarding their own and others art.

The children self and peer assess their work against the lesson objective, the teacher will then mark against the same objective.

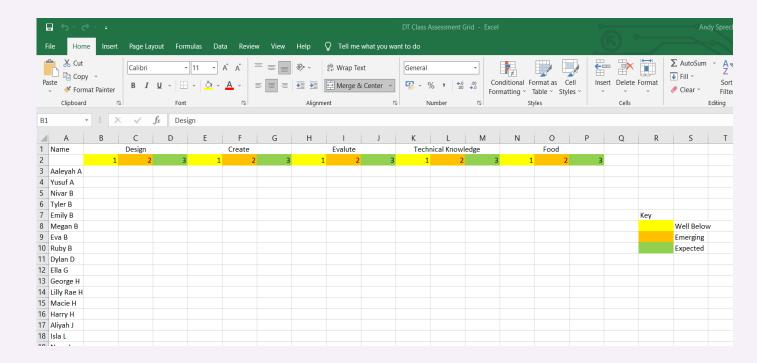
Marking of work is in the style of a positive and next step comment which informs the child of how they can develop and improve their work in the future. This is discussed, shared and agreed with the child.

The design and technology lead gathers pupil voice to inform our planning and future learning of skills and knowledge.

We collect summative assessments at the end of every term and year to analyse cohort and individual children's progress of knowledge and skills.

This demonstrates where children are in particular skills or knowledge assessing them as well below, emerging or expected.







Parental Involvement

We are passionate about involving our parents in their child's curriculum and learning and therefore like to inform them as much as possible about topics, designers, skills and knowledge their child will be covering.

We have created opportunities within the year for parents to come and view their children's deign and technology work in the style of an open day workshop. This allows the children to view their peers work as well as sharing their achievements with their parents. The children also enjoy looking at the future projects and being inspired to the projects they will be covering in the higher year groups.

We also gather parental voice to enable us to find out how best to support our parents and what they feel comfortable being involved with and how best to share their child's progress and achievements.



Special Educational Needs

For any pupils who require different support, design and technology lessons may be adapted in the following ways in order to help meet the needs of individual or groups of children by:

- -Having appropriate levels of adult support / guidance.
- -Ensuring the child are at the front when modelling a technique. Allow the children some free time to explore and experiment with the materials and tools (sensory needs).
- -Showing the children the materials and tools to be used before the lesson begins.
- -Supporting with or different methods of recording any written ideas.
- -Giving extra time to complete lessons.
- -Providing a quieter space to complete lessons.
- -The objectives for the lesson may be adapted to set suitable learning challenges and goals.
- -To ensure appropriate workspace, including easy reach of all tools and materials and address any lighting issues if needed.
- -To use different coloured paper to provide printed work on.
- -To use specialist equipment such as cutting tools or frames to hold work in place.
- -To use visual and kinaesthetic teaching methods used to help appeal to all learning types.
- -To recap skills learnt in previous lessons and revisit key points.