

Curriculum: Design & Technology



'Design is not just what it looks like and feels like. Design is how it works'

Steve Jobs

Why do we learn D&T?

Design and technology is an inspiring and practical subject. Using creativity and imagination, children design and make products that solve real and relevant problems, considering their own and others' needs, wants and values. To do this children are required to draw on disciplines such as mathematics, science, engineering, computing and art. Through design and technology children will also learn how to take risks, becoming resourceful, innovative, enterprising and capable citizens. Through the evaluation of past and present products, children develop a critical understanding of the impact on daily life and the wider world these items can have. The design and technology curriculum makes an essential contribution to the creativity and culture of the children providing them with essential skills for the future.

What are the aims of our D&T curriculum?

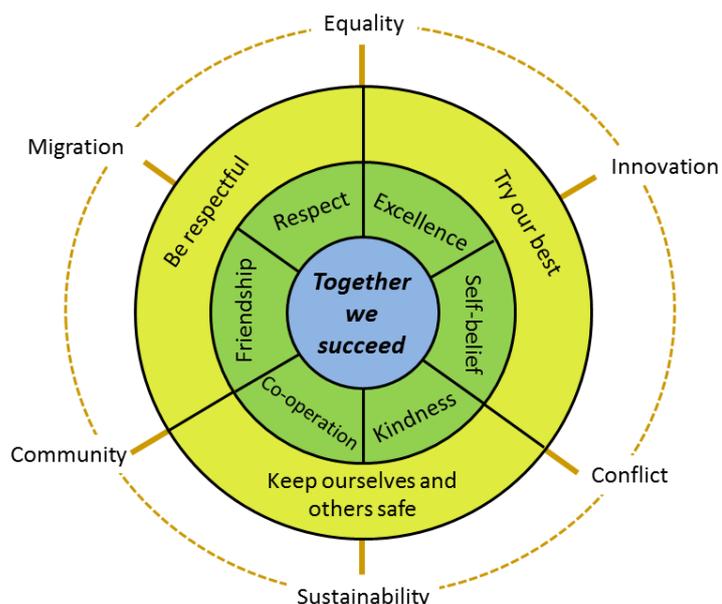
At Werrington Primary School we want to give our pupils the opportunity to develop skills, knowledge and understanding of designing and making functional products. We feel it is vital to nurture creativity and innovation through design, and by exploring the designed and made world in which we all live and work. We believe that design and technology should focus on stimulating the children's imagination and experimental side while learning about the practical elements such as; knowledge and understanding of materials and components, mechanisms and control systems, structures, existing products, quality and health and safety.

Design and technology is also a great way for children to work collaboratively, by doing so, this develops the skills and ideas of team work, communication, community and resolving conflict. As children progress through the school, we provide them with opportunities to produce products which they can see, touch – and even taste through food technology, textile work and construction kits.

The way the D&T curriculum at Werrington Primary School is organised gives children a context for discovering literacy, mathematics, science, art, PSHE and ICT. It also provides a firm basis for later learning in the subject and a platform for developing skills in literacy and numeracy.

At Werrington Primary our bespoke curriculum has 6 golden strands which encompass the core values of our school. These strands run through the Art curriculum from Nursery to Year 6. Examples of this can be found in the table below.

Equality	Year 2 create sandwiches and think about a balanced and equal diet.
Innovation	Year 5 create bridges and learn about the engineers who design and build them.
Conflict	Year 1 create their own pizza topping and think about how we need a variety to please all customers.
Sustainability	Year 6 create 'rag rugs' and think about reusing old material for a new purpose.
Community	Year 4 create torches in teams to help as part of their survival in the rainforest together.
Migration	Year 3 create their own version of a Shuduf and look at the transportation of water for farming.



An example of progression in Design & Technology: Textiles

Year 6

Finally children will learn about decorating fabrics appropriately before joining the components together. They will be sure to pin and tack fabric pieces together to help with the process of sewing. Using the stitches they have learned, children will use the most appropriate to join their pieces of fabric.

Year 5

Now children will learn about pattern layout and how pieces come together to make a 3D product. Children will refine their sewing skills and join fabrics using over sewing, back stitch and blanket stitch.

Year 4

Children will now learn about seam allowance and explore fastenings and recreate some e.g. sew on buttons and make loops. They will also consider using appropriate decoration techniques such as appliqué

Year 3

Children will start to measure, tape or pin, cut and join fabric with some accuracy independently and join their own choice of fabrics using running stitch, over sewing and back stitch.

Year 2

Next children will learn to cut out shapes which have been created by drawing around a template onto the fabric and join fabrics by using a running stitch, staples, over sewing and tape.

Year 1

Children are given the opportunity to match and sort fabrics and threads for colour, texture, length, size and shape and consider their properties. Children also look at how to join fabrics with glue.

EYFS

Children are encouraged to play with and use a variety of textiles and fabrics, create simple weavings and decorate fabrics using paints, pens and adding embellishments with glue.

