Member of Staff Responsible: T Harvey Policy Written: November 2022 Approved by governors: December 2022 Date for renewal: December 2025



## Design Technology Foundation Subject Policy

## <u>Intent</u>

"Have nothing in your house that you do not know to be useful or believe to be beautiful" William Morris

Design and technology is an inspiring, rigorous and practical subject. Using creativity and imagination, pupils design and make products that solve real and relevant problems within a variety of contexts, considering their own and others' needs, wants and values. They acquire a broad range of subject knowledge and draw on disciplines such as mathematics, science, engineering, computing and art. Pupils learn how to take risks, becoming resourceful, innovative, enterprising and capable citizens. Through the evaluation of past and present design and technology, they develop a critical understanding of its impact on daily life and the wider world. High-quality design and technology education makes an essential contribution to the creativity, culture, wealth and well-being of the nation.

# WE CAN provide teaching that develops knowledge and skills so children can learn and progress effectively

It is our intent that DT skills are introduced progressively and children have opportunities to revisit what they have learnt before. Vertical links to what children have already experienced are embedded. Horizontal links are made whenever possible

#### WE CAN offer enriching activities, events and experiences

It is our intent that DT lessons include memorable chocolate chip events and activities which enrich learning.

#### WE CAN work together to remove barriers and ensure equality

It is our intent that DT teaching develops the skills of all children from their starting point. For pupils with EAL the experience of cooking or building is a universal one that they can engage in without a language barrier. Where needed, children with special educational or sensory needs are supported to engage with lessons and record their ideas in an accessible way so they are able to achieve.

WE CAN build independent and resilient learners who are able to communicate confidently It is our intent that the embedded principles of independence, resilience and communication are embedded in DT teaching. Children are encouraged to work towards a design brief, meet design criteria and explore their own ideas in DT lessons. The process of developing a product has evaluation and re-drafting built in and children are supported in this process and encouraged to employ a growth mindset. Shared design work gives pupils a clear purpose for expressing their ideas.

# WE CAN listen to and treat each other and all members of the community with respect, tolerance and concern

It is our intent that through DT learning, children demonstrate respect, tolerance and concern for others. This is especially true during evaluations where children learn about using supportive language, sharing feedback sensitively and celebrating others' successes.

#### WE CAN recognise ability, maximise potential and prepare children well for their future and life in modern Britain

It is our intent that our DT teaching will prepare children for their futures. Skills learnt in DT are life skills which will allow children to feed themselves and understand how things work in their adult lives. Children learn to work through the various stages of a project, this experience is transferable to other project based work.

It is our intent that Our DT curriculum sets the foundations for pupils continuing with DT in their secondary schooling.

It is our intent that An interest in DT at primary school may lead children into design, catering or engineering in their future lives.

## Implementation

#### Roles and Responsibilities

- The Class teacher is responsible for delivering DT learning as outlined in the curriculum
- The DT subject leader is responsible for
  - Updating unit plans in response to annual evaluations
    - $\circ$  ensuring all resources for teaching are available and well organised,
    - o offering support with DT teaching and learning,
    - o maintaining an oversight of assessment outcomes,
    - monitoring the quality of teaching and learning,
    - $\circ$  keeping up to date with the latest best practice DT teaching.
- The Curriculum Manager is responsible for supporting the DT subject leader in their role.
- The Academic Lead is responsible for ensuring progression and continuity across the school.
- The Headteacher is responsible for overall academic provision and performance.

#### **Organisation**

DT teaching is blocked. 2 units are taught each year. One is a cooking and nutrition unit. The other is a construction unit. In the EYFS DT is addressed through the Expressive Art and Design area of learning.

The units are outlined in the Curriculum Document.

DT is included in the annual cycle of homework projects. This allows children to engage in project based design work at home with their families.

#### Teaching and Learning

A DT unit should follow a research, plan, do, evaluate process.

Best practice is for DT lessons to include practical tasks and activities and to be set in a real life context addressing a particular problem or client need.

#### Modelling:

A varied range of models, examples and images should be used for exploration or to demonstrate how things work. Modelling of how to complete tasks should form part of the teaching process. This can include identifying improvements.

Scaffolding:

To enable all children to develop from their starting points, scaffolding strategies should be used to enable children to complete an increasingly challenging standard of work with increased independance. Differentiation:

Children of all ability levels should be supported to access DT work and to record their ideas in an appropriate way. Modifications to practical tasks including the use of different apparatus or additional adult or peer support may be appropriate.

Lower ability children may be asked to share their ideas verbally or have a simpler proforma for recording.

To extend the most able children, tasks may be modified to require additional explanation or alternatives.

Skills:

Children will have opportunities to develop team work skills and resilience as well as communication skills when presenting their plans and products.

Cross Curricular Opportunities:

Opportunities for cross curricular maths, writing or reading and for the use of technology should be embedded in learning regularly.

#### <u>Planning Process</u>

Unit Plans:

A unit plan showing content and progression is provided to staff in Curriculum folders.

Vertical links allow DT learning to build progressively between year groups.

Horizontal links allow children to link their DT learning to other subjects in their year band.

Diagonal links allow children to link their DT learning back to other subjects covered in earlier year groups.

Mapping:

Teachers delivering the unit will map out the content across the number of lessons available. The DT subject leader is available to offer advice on Medium Term Planning.

At this point, class teachers must identify which resources will be required, check what is available and make a request to the DT subject leader for any additional resources required. Lesson Planning:

Teachers then plan individual lessons to deliver the required content.

Lesson plans should contain differentiation as appropriate to the children. The focus for lessons should be on the DT knowledge and skills.

#### <u>Resources</u>

Textiles are stored between the KS1 and KS2 hall.

A trolley holding woodwork tools is stored in the art cupboard.

The DT cupboard holds consumable construction resources and the cooking and nutrition resources. Please keep all resources tidy and clean as you find them.

We are unable to request a payment for cooking ingredients as cooking is a part of our core curriculum. A budget allocation of  $\pm 20$  per class is allowed to cover the costs of ingredients and consumables (e.g. bags or foil).

#### <u>Health and Safety</u>

Some lessons in DT will include an element of risk. In these instances, class teachers should identify the best ways to mitigate risk e.g. by setting clear expectations or increasing the level of adult support. Teachers must discuss any health and safety concerns with a Senior Leader and make reference to any risk in planning on Smart boards. Where children will be exposed to food stuffs, the class teacher must check the latest allergy information and send a note to parents informing them that children will be cooking in school.

#### Equality and Inclusion

DT teaching will be accessible to all children and challenge them appropriately. Where children need additional support this may be provided through scaffolding or adult support as part of universal provision.

Recording

Children from Year 1-6 have a DT exercise book in which they are able to record any of their own individual work. It is appropriate to include any research, planning or evaluations and to stick a photograph of a finished project in the book.

When children work in a group, large paper sheets is often an appropriate mechanism.

Class teachers may choose to have a class working wall display during the course of a unit. This should feature examples of work and key vocabulary.

## <u>Impact</u>

By the end of their time at Grendon Primary School children will have been exposed to a wide range of DT projects. They will understand the design process and be able to research requirements for a product, make plans and designs individually and as part of a team, demonstrate construction and cooking skills and make evaluations.

Children will learn life skills of a healthy balance. Children may be inspired through their DT lessons to pursue a future career in design, catering or engineering.

#### <u>Assessment</u>

Assessments are made at the end of each unit. Class teachers refer to the assessment criteria referenced on unit plans and make a judgement on which children are meeting the expected standard, below the expected standard or exceeding the expected standard.

The DT lead will analyse the data and identify strengths, weaknesses and any area where additional support is needed.