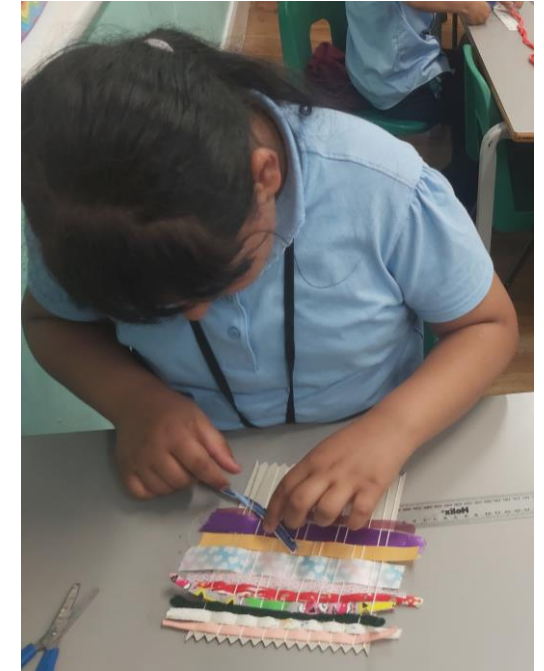




Strategy Statement for Design Technology



Meet the DT Lead



Miss Pearce

Our Shared Vision



Striving for excellence in everything we do

High Quality
Education for
ALL

Effective
home/school
and community
partnerships





Equality Mission Statement (Equality Act 2010)

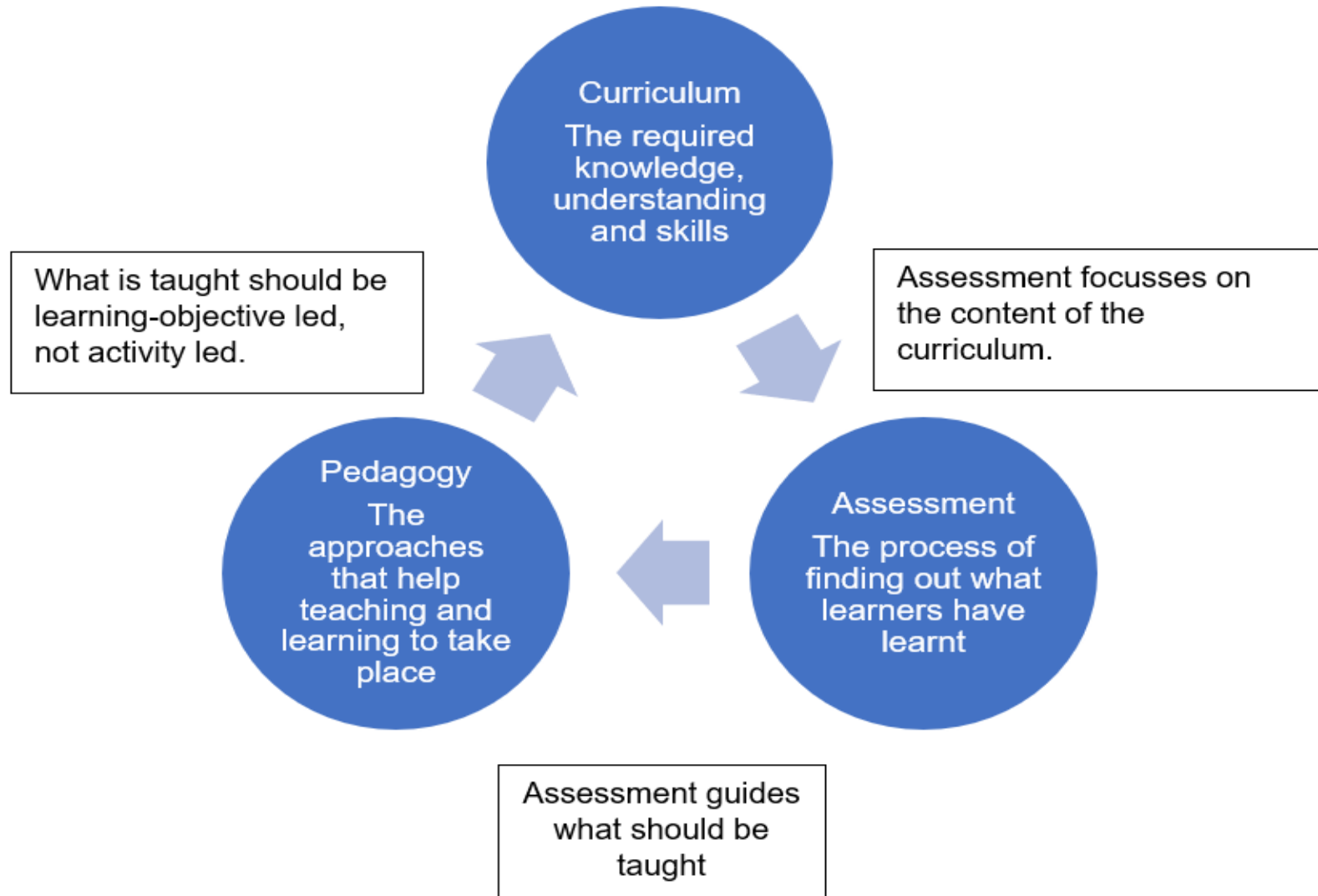
We are committed to ensuring equality of educational opportunity and support for all pupils, parents, carers, staff and visitors irrespective of age, sex, race, disability, religion or belief, sexual orientation, pregnancy, gender reassignment and socio-economic background.

We aim to provide a fully inclusive school in which every person feels proud of their identity and is able to participate fully within the school community. We believe that a diverse school community is a strength which should be respected and celebrated by all those who learn, teach and visit here. These statements are enshrined in our school motto, 'Respecting One Another.'

In DT, we will ensure that all children are able to access projects – especially more practical work.



Our Curriculum Coherence model is broadly made up of three parts: Curriculum, Pedagogy and Assessment.



Statement of Intent



Rationale

Design and technology helps to prepare children for the developing world. Here at Becontree we encourage children to think of themselves as creators and designers, and to become creative problem solvers, both as individuals and as part of a team. Through the study of design and technology, they combine practical skills with an understanding of aesthetic, social and environmental issues.

Design and Technology helps all children to become informed consumers and potential innovators. We hope it will assist children in developing a greater awareness and understanding of how everyday products are designed and made.

Why is Design Technology important to children at Becontree School?

Design and technology is a varied, creative and practical subject allowing learners to use and develop lifelong skills in a range of different contexts, through a variety of media. It is a cross curricular subject which ensures that essential skills are developed for learners to be successful in maths, science, computing and art.

Learners are required to think critically and encouraged to '*think outside the box*,' in order to find solutions to real life problems.

Our Key Learning Intentions

Our DT Curriculum helps children develop key cross-curricular skills, including an ability to:

- research
- plan
- create
- problem solve
- adapt
- evaluate
- think critically

As children at Becontree Primary School love learning in DT , they become...

Effective Communicators through:	Responsible and caring citizens through:	Active Contributors through:	Successful and independent learners through:	Confident and ambitious individuals through:
encouragement to participate in conversations, listen to others, respond appropriately and take turns to speak during lessons feeling that their contributions are valued and being taught to respond thoughtfully to others encouragement to debate issues respectfully modelling subject specific language clearly and effectively by teachers with expectation for pupils to include it in their responses 	teaching children to consider the environmental impact of design and materials and to be responsible consumers and designers building an awareness of how technology is and could be used in life outside of school and the impact it has on the world 	working collaboratively on projects engaging in discussions during lessons answering and asking questions 	engaging in self-assessment and evaluation of their work encouraging children to problem solve and self-improve encouraging children to have opinions based on facts to make educated decisions encouraging children to independently consider the best tools for the task encouraging children to tinker and problem solve 	exposure to a wide range of knowledge to build understanding and confidence in their own thoughts and opinions developing an appreciation of the wide range of jobs available in design and that anyone can be an inventor or designer exposure to roles-models and pioneers in design and technology who inspire and influence 

Promoting Personal, Spiritual, Moral, Social and Cultural Development and Fundamental British Values



Children are provided with opportunities to work cooperatively in all subjects developing the skills and personal qualities necessary for living and working together in a multi-racial, multicultural society.

We help children to develop...

Awareness of the ways that science and technology can affect society and the environment;

Consideration of the moral dilemmas that can result in technological advances;

Respect for differing opinions and ideas;

The ability to meet challenges of living and learning in a technologically-enriched, increasingly inter-connected world;

Clear guidelines about safe and responsible use of the Internet;

An understanding of advances in technology and science and appreciation for human achievement;

The ability to reflect on products and inventions, the diversity of material and ways in which design can improve the quality of our lives;

opportunities to work as a team, recognising others' strengths and sharing equipment.

How do we encourage children to think of themselves as designers?

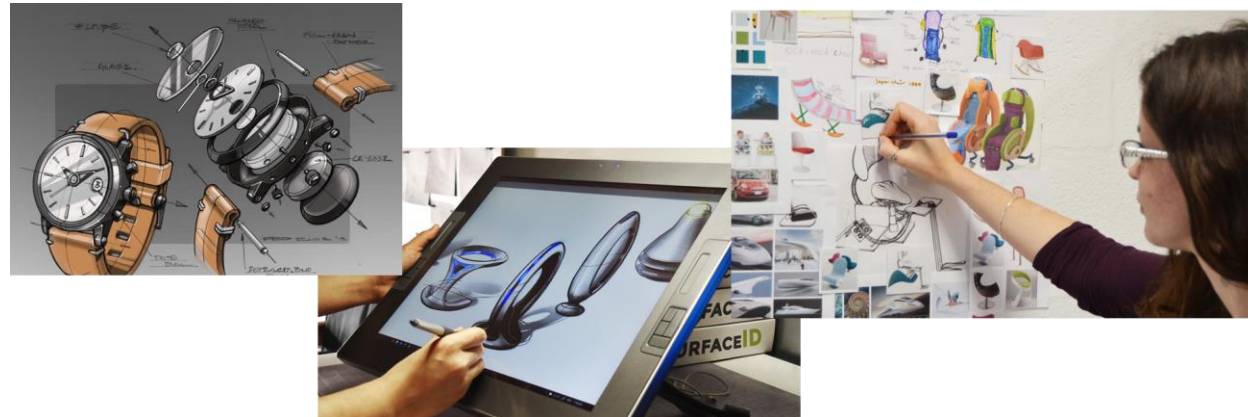
Here at Becontree Primary School, we encourage children to become creative problem solvers, both as individuals and as part of a team.

We teach the children how to research, plan, create, problem solve, adapt, evaluate and think critically. We help to prepare our children for the developing world, giving them the opportunity to work independently and developing their skills of collaboration and team work.

Through the study of design and technology, our children will be able to combine practical skills with an understanding of aesthetic, social and environmental issues. They also learn essential practical skills that can be used creatively across all subjects throughout the curriculum, and into later life.

Design and Technology encourages our children to become discriminating and informed consumers as well as potential innovators.

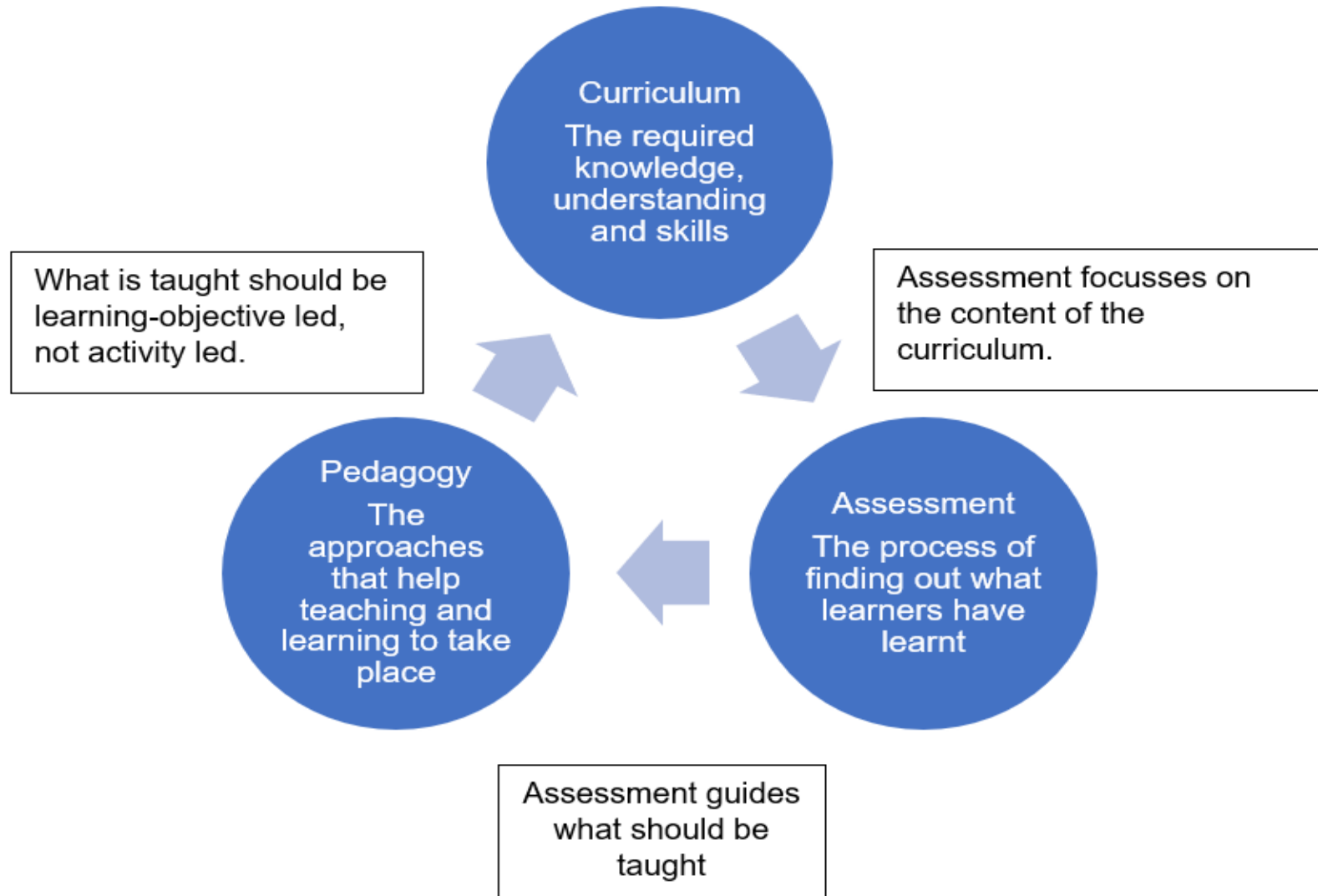
We hope it will assist our children at Becontree Primary School into developing a greater awareness and understanding of how everyday products are designed and made.



How do we encourage children to become designers?



Our Curriculum Coherence model is broadly made up of three parts: Curriculum, Pedagogy and Assessment.



Teaching and Learning Approach (Pedagogy)

Planning and delivery of learning to meet the needs of all children

- Units of work in DT are taught in blocks. (approximately 20 – 30 hours over the year)
- Most year groups have 2 blocks of 3-4 hours per week and most blocks last on average 3 weeks.
- Schemes of work are provided for teachers. It is an expectation that these are followed precisely and that any changes are discussed with the subject lead.
- Knowledge and skills are taught explicitly and units demonstrate progression from one year group to the next.
- All children can access the learning as some support is given. e.g vocabulary cards and some tasks may be differentiated if needed.
- Some links are made with other subject areas where appropriate. e.g. year 1 sock puppet unit linked to history of toys unit and year 5 Fairground unit linked to ICT (Using Crumble to programme mechanism)
- A range of teaching approaches, resources and visual stimuli are used to support learning. This includes approaches that encourage boys to be more engaged e.g. practical activities and hands-on learning.
- Quality, engaging resources and worksheets are used in lessons.

Developing Long-term knowledge retention

- We teach in blocks to allow more time for children to immerse themselves in the unit.
- Focus on key knowledge as well as developing skills.
- Using a range of teaching approaches to engage children and help them to remember what they have learnt.
- Children are involved in the compilation of Learning Journeys and have that as a reference to previous learning.
- Teachers have easy access to information about prior learning through the Curriculum Folders and are able to check and re-cap regularly.
- By teaching some units cross-curricular, children have more opportunities to embed key knowledge.

The following are our key beliefs about when and how children learn best.
We believe children learn best when...



...they are taught by well-trained staff who are passionate about teaching and learning.	...they are valued and treated fairly and respectfully.	they have a growth mindset.
...they are given the right level of support and challenge.	...they are interested and engaged.	...new learning makes links with and builds on prior learning.
...they understand the learning objectives and know what success looks like.	...they have opportunities to learn with and from others (collaborative learning).	...they receive regular and timely feedback (from both teachers and peers).
...they are given enough time to practise, consolidate and apply new learning.	...they are taught in a physical space that is conducive to and supports effective learning.	...there is a strong partnership between home and school.

Curriculum

Developing Teacher Subject Knowledge	• In school, and external, training and development opportunities. • Shared practice. • The scheme is developed to support teachers with different levels of experience. • Teaching and Learning Reviews are used to identify areas for further development.
Health and Safety	• General Health and Safety Guidelines updated regularly. • Some specific DT related guidance for H and S built into planning. • Cooking knives and saws for woodwork are locked away. • 'How to use safely' posters are included with equipment e.g. glue guns
Resources	• All units are well resourced. E.g. ovens for cooking, knives for cutting. • Staff know how to access resources and order more when needed.
Enrichment opportunities	• We ensure that children can complete projects with a finished product they can be proud of to encourage participation and a sense of achievement. • Technology related trips where possible. • STEM Days
Parent and Community Partnerships	• Family projects e.g. Becontree Bake-off. • Projects shared on the website. • School reports to give information related to DT.

Finding out what Learners Know

Evidencing Learning Outcomes

- Ongoing Formative Assessment.
- Checking Prior Learning.
- Exit tasks to check End points.
- Learning Journeys are used to evidence learning in lessons.
- Display boards in classrooms and corridors reflect a selection of topics.

Curriculum Overview- Design Technology

For more detail please refer to the subject scheme of work

	Year 1 All cross-curricularly linked	Year 2	Year 3	Year 4	Year 5	Year 6
Term 1A			Mechanisms – Levers <i>Fabulous Flowers moving pictures (1)</i>	<i>Design and make a marble run (paper engineering) (1)</i>		
Term 1B	Nutrition and Cookery <i>Sandwiches</i>					
Term 2A	Textiles Making Sock Puppets (2) Nutrition and Cookery fruit kebabs (3)					Nutrition and Cookery <i>Bread and soup(1)</i>
Term 2B	Mechanisms - Sliders <i>3D Island/creating maps (3)</i>		Nutrition and Cookery <i>Making pizzas (2)</i>	Weaving (2)	<i>Design and make a controllable fairground ride (uses Crumble) (1) <u>LINKED</u> TO SCIENCE AND ICT</i>	
Term 3A		Textiles (sewing) <i>Felt puppets (2)</i>				
Term 3B		Mechanisms – levers <i>Making moon buggies (2)</i>				
Key skills and techniques taught	• Cutting with knives • Spreading • Cutting – using scissors correctly and with control ▪ Scissors pointing forwards – move the material ▪ Cut at the hilt • Gluing • Using sliders	• Basic sewing stitch • Using a lever • Strengthening and stiffening structures • Using wheels and axels	• Using sharp knives • Grating • Using linkages <i>or</i> pneumatic systems • Joining paper and card – ▪ tabs ▪ split pins	• Joining paper and card – ▪ using slots ▪ tabs and slots ▪ joining tubes using flanges • Weaving	• Using pulleys and/or gears • Controlling models with a computer (Crumble) • Cross section and exploded diagrams • Sawing wood • Reinforcing 3D structures • Using hot glue guns	• Kneading • Baking techniques and knowledge (yeast) • Measuring • Using sharp knives • Peeling • Grating

Curriculum Overview- DT in EYFS

For more detail please refer to the subject scheme of work

Nursery	Reception
Relevant statements for DT from 2020 Development Matters	
Select and use activities and resources, with help when needed. Use one-handed tools and equipment, for example, making snips in paper with scissors. Explore how things work. Explore different materials freely, in order to develop their ideas about how to use them and what to make. Develop their own ideas and then decide which materials to use to express them.	Develop their small motor skills so that they can use a range of tools competently, safely and confidently. Use their core muscle strength to achieve a good posture when sitting at a table or sitting on the floor Explore, use and refine a variety of artistic effects to express their ideas and feelings and develop their ability to represent them. Use a range of small tools, including scissors, paintbrushes and cutlery. Safely use and explore a variety of materials, tools and techniques, experimenting with colour, design, texture, form and function