

Design & Technology Curriculum Map: Year 8



Students in year 8 spend half of the academic year in DT and the second half in Food Technology. At this point in the year, the students swap subjects.

Project 1



Aim:
This project will help you get better at not giving up.
You will be given a task that you can achieve.

Designing:
You will improve your car by:
Making it
Testing it
Improve it
Race it



Things to check:

- **weight** – is it too heavy?
 - **friction** – do the wheels move smoothly?
 - **stability** – does it stay balanced?
 - **construction** – is it made well?
- Remember:** Small changes can make a big difference.

Knowledge:

- You will learn how forces can make something move.
- A vehicle moves when the forces are not balanced.
- You will also learn how energy and weight affect speed.

Project 1 Cars that move



You will need to:

- try your best
- solve problems
- improve your work
- make changes
- keep going when it is difficult

The aim is to make your final work better and stronger.



Skills:
You learn by testing your vehicle and watching how it moves.

Look for small problems.
Fixing small problems can make your vehicle work much better.

Knowledge

To make a vehicle move well, think about:

- **force** – what pushes or pulls it?
- **energy** – what makes it move?
- **weight** – is it too heavy?
- **speed** – how fast does it go?

Remember: A lighter vehicle with enough energy can often move faster.



Project 2



Aim:
This project will help you get better at working with others
You will make something that people will buy.

Skills

Communicate ideas using pictures
Create posters to promote your cupcake



Skills

Use rapid prototyping like the laser cutter to make card models of your packaging.

Make final changes and then create their final designs out of coloured card

Make:

- Create a prototype of your packaging
- Find out what other people think about it.



You will need to:

- Work with other people.
- Think about food packaging.
- Find out how pictures can tell people about products
- Find out how colour is used to tell people about flavour.



Make:

- Create a house structure
- Add rooms for specific activities

Research:

How houses are used and how they are different.

Evaluate: Evaluate your design by finding what it is good and what you can do improve it.



Project 2 DT & FT cross curricular Café project

Project 3 Dream House project