

Design Technology Curriculum Map: Year 7



Students in year 7 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.



Things to check:

- **Size** – is it too big to carry?
- **Maze** – not too easy, or not too hard?
- **Safety** – does it have a plastic cover?
- **construction** – is it made well?

Remember: Small changes can make a big difference.

Knowledge:

You will learn how mazes can be made

You will learn that a maze must be not too easy, and not too hard



Project 1



Aim:
This project will help you get better making things, and show how you can make an idea onto a real object.

Designing:

You will improve your maze by adding a theme, and making a challenging maze.

Project 1 Cars that move



You will need to:

- Test your maze on others
- solve problems
- improve your work
- choose a theme
- keep going when it is difficult



Skills:

You learn by watching and listening

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



Testing

You will learn that testing your ideas on others will give you lots of information on how to improve your maze.

Project 2

Project 2 Building bridge structures



Skills

Learn how to build structures that will carry more than they weigh.



Skills

Use Test to see how you can make the bridge stronger.

Analyse the test to find the weak point and make it stronger.

Aim:

This project will help you get better at working with moving parts.

Make:

- Create a prototype bridge that is strong
- Find out how much weight the bridge can carry



Make:

- Create a prototype bridge that is strong
- Find out how much weight the bridge can carry



Research:

Look at the shapes that are used and test their strength



Evaluate: Evaluate your design by finding what it is good and what you can improve. Find ways they can improve it

You will need to:

- Work with other people.
- Making 3D shapes.
- Find out how different bridges are made.



Project 3 Ferris wheel project