

## Computing: Algorithms

*Last week we looked at what an algorithm was. Can you remember what it means?*

### What Is an Algorithm?

An algorithm is a precise set of instructions that you follow to solve a problem or complete a task.

We use algorithms all the time without even realising it.



### Getting Dressed

You follow a step-by-step procedure to get dressed in your school uniform every morning.

For example:

1. Put on underwear and socks.
2. Put on trousers.
3. Put on shirt, followed by tie.
4. Put on jumper.
5. Put on shoes.



### Recipes

When you follow a recipe, you follow instructions to complete a task.

The instructions are a step-by-step procedure that need to be followed for your recipe to be successful.



### The Order of Algorithms

Algorithms need to happen in the correct order.

What would happen if you put your coat on before your school shirt?

Or you put your shoes on before your socks?



### Algorithms in Technology

Digital devices all follow algorithms in order for them to work.

You use an algorithm to tell a computer what to do.

Everything you can do on a computer is able to happen because an algorithm has been written for it.

Clicking a mouse, opening a word document and playing a game are all examples of things that have algorithms.



Challenge: Your challenge today is to write your own algorithm!

What we would like you to do is write an algorithm on how to make a jam sandwich. (You can use a different filling of course).



You can follow these six steps to help you or you might want to add in more detail with more steps.

(Top tip: you might want to make the sandwich first and then write the instructions (algorithm).

First...

Next...

Then...

After that...

Finally...

Once you have written your algorithm ask someone in your family to follow them and make their own sandwich. Are your instructions clear enough? Have they made a sandwich? If they had trouble following your instructions what would you change or add in to make it easier next time?

Tuesday 2<sup>nd</sup> March 2021