| River Bank Primary Knowledge Organiser | Year 1 | Spring Term 1 & 2 | We are space racers |
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## What we will learn

### Animations in Scratch Jr.

Programming is when we make a set of instructions for computers to follow.

Scratch jr. is an app that we can use in order to code our own stories and animations. It involves **sprites** (characters on the screen).

We use **algorithms** (a set of instructions to perform a task) to program the sprite to do different things.

## E-safety

Be safe online

**SMART**

Stay Safe | Don't Meet Up | Accepting Files | Reliable? | Tell Someone

## Sequencing

**Sequences.** A sequence is a pattern or process in which one thing follows another. In Scratch Jr. we can stack **blocks** together side by side in order to create programs made up of sequences.
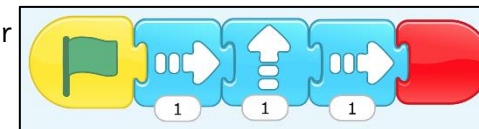
**Deleting Blocks**: Blocks can be removed from programs by dragging them from the programming area back into the **blocks palette**.

**Repeating Blocks**: For something to happen more than once, we can change the number underneath the block.

**Running the Code:** Run your animation by tapping the full screen icon, and then the **green flag**.

## The basics of Scratch Jr.

**What is Scratch Jr?** Scratch is a website/ app that lets us code our own stories, games and animations.

**Sprites:** Scratch Jr. uses characters called sprites. The main sprite is a cat called Scratch.

**Home:** Clicking on the house takes you 'home' to your project screen.

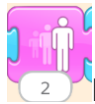| Getting started | | Algorithms and programming | Debugging |
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## Getting started

The + (right) starts a new project.

These (right) are the **programming blocks**. We drag them into the programming area (right).

 Makes the sprite **grow**

Makes the sprite **shrink**

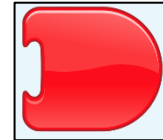Clicking the block in the area makes the sprite perform on the **stage**.

**Background**: Backgrounds are added by clicking this icon (right).

**Start Blocks**: Start blocks are yellow. These are used to start/ run programs.

**End Blocks**: End blocks are red. These show what happens at the end of your program.

## Algorithms and programming

An **algorithm** is a set of instructions for performing a task.

Designing an algorithm can help us to make the sprite do the things that we want it to do.

**Programming** is when we move the blocks into the position (based on our algorithm design). Our programming codes the sprite to perform the actions.
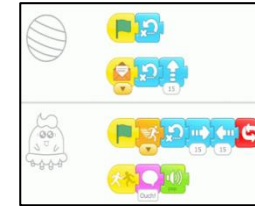
## Debugging

Sometimes, things don't work exactly how we want them to the first time. This may be a problem with our algorithm, or we could have made a mistake in our programming.

If the animation does not work correctly the first time, remember to **debug** it. This means **finding** and **fixing** the problems.