

Skills Progression - Computing (Year 1-6)

Year Group	Coding and programming	Working with images	Communicating	Presentation	Word Processing	Computer literacy	E-safety
1	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Program an algorithm on Probots. Record algorithm instructions in a written format. Understand that algorithm instructions are what the machine will do. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Copy and paste. Position a copy and pasted image on to a page. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Understand that they can communicate using technology. Develop mouse control skills. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Create a simple presentation on a given topic. Use a presentation to present on a topic. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Find and record simple facts. Save work and access this as needed. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Turn a computer on and off. Log on to a computer, with support. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Know that we need to be safe online. Know that they <i>never</i> use a device without adult supervision.
2	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Use Rainforest Coding Unit 1. Understand that by using the Probot they are creating a program. Experiment with different lengths when programming the Probot. Debug by experimenting with different turns and lengths of movement. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Create a photo collage using images found on the internet. Create a collage using photos that they have taken and uploaded themselves. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Understand that information technology is not just computers. Understand that using a phone, tablet, music playing device are all examples of IT. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Change the background of their presentation and apply this to all slides automatically. Choose a specific slide from which to start their presentation. Use a keyboard to start and control a presentation. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Change the font, type size and colour of text. Italicize, underline and make text bold. Use a text box to insert text into a document. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Select an appropriate programme with support. <p>Log on, save and open their work independently.</p>	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Always let an adult know when they are going online. Know about game age ratings, and that there is content online that is inappropriate for them.

Skills Progression - Computing (Year 1-6)

Year Group	Coding and programming	Working with images	Communicating	Presentation	Word Processing	Computer literacy	E-safety
3	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Use Rainforest Coding Unit 2 and 3. Understand why algorithms sometimes fail and know what to do to correct them. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Identify whether a picture is real or fake. Create their own doctored image using software. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Message people who are not in the room and receive a response. How to stay safe while messaging. Communicate with pupils from another school using this medium. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Use charts and graphs from Excel in Powerpoint to present. Research, create and present a 5 minute presentation on a topic of their choice, independently. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Use Word Art. Insert clip art into a document. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Select an appropriate programme independently. How to change the volume on a computer. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Understand what is appropriate to share online. Know what to do if something happens online that they are uncomfortable with.
4	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Use Rainforest Coding Unit 4. Design and write simple programs that achieve goals. Debug programs, applying logical solutions. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Experiment with different filters and effects that can be applied to a picture. Make choices about which effect to use for which purpose. Create and use .gif files. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Mail-merge a letter. Apply skills from Word Processing units to create a template for their letter. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Research and create a presentation on Powerpoint. Include simple transitions in a presentation. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Place work into columns in order to write a news report. How to add effects to an image to make it fit the piece. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Use keyboard shortcuts when typing. i.e. shift for a capital. Use computer tools such as calculator. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Be aware of the risks involved in 'instant messaging'. Be aware of online bullying. Take steps to resolve online bullying.

Skills Progression - Computing (Year 1-6)

Year Group	Coding and programming	Working with images	Communicating	Presentation	Word Processing	Computer literacy	E-safety
5	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Use Rainforest Coding Unit 5. Create programs that involve automatic repetition and sequences to achieve an end goal. Design, create and debug simple programs that control a physical system. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Take and upload a picture from one device to another. Make simple corrections to a photo using Windows picture viewer. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Send and receive emails. Use tools within the email service to add emphasis to certain parts of an email. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Embed a video into a presentation. Give an entrance effect to an image on a PowerPoint. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Create, adjust and use a table in a word document. Create an interactive document using hyperlinks. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Design and print a 3D model, with support. Use task manager to resolve simple computer problems. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Be aware of how personal information, such as pictures, can spread. Be aware of 'pay to play' apps and the need to be responsible financially. Learn the ways in which search results can be skewed.
6	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Use Rainforest Coding Unit 6. Apply logic to find and fix bugs in a program or algorithm. Design, create and debug more complex programs involving repetitions that control a physical system. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Make changes to an image using Photoshop. Be aware of edited images in magazines. Use green screen to give them an interesting background. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Host a conference call style debate with another school using online technology. Understand the risks involved with online technology. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Use transitions and automatic timings to enable them to present on a given topic. Insert sound files onto a PowerPoint. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Apply a background to a word document and print it. Adjust the page layout to suit the purpose of their work. Use headings and bullet points to organise their work. 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Design and print a 3D model, independently. Experiment with different programmes for familiar purposes and make an informed choice as to which they prefer (i.e. Prezi). 	<p>Pupils will be taught to:</p> <ul style="list-style-type: none"> Make informed choices about apps. Understand the risks of social media and know how to avoid them. Know about sending and receiving appropriate and inappropriate content, and what to do if somebody has an image of them they are unhappy with. About 'fake news' and how to spot whether something is real or fake.



Skills Progression - Computing (Year 1-6)

Notes:

- It is assumed that basic internet skills will be embedded throughout each year as part of standard teaching practice and this should be shown in planning.
- When using Rainforest Coding, children should not move onto the next year's unit - they should be moved onto a suitable challenge on 'Hour of Code' instead.
- Research skills should be modelled and embedded in all sessions that require the retrieval of images/information in order to use the software.