

Lancaster Road Primary School - Progression of computing Skills

Year 1	<p>Programming:</p> <ul style="list-style-type: none"> I can move a programmable toy in different directions I can combine commands to follow a route I can explain what an algorithm is I can describe and write algorithms to complete specific tasks 	<p>Graphs:</p> <ul style="list-style-type: none"> I can sort items into sets I can draw a simple graph, e.g. pictogram / block graph I can explain what the graph shows 	<p>Word processing:</p> <ul style="list-style-type: none"> I can use letters, basic punctuation, spacebar and enter key to type words and sentences quickly I can use backspace to make corrections I can use shift key for punctuation 	<p>Research:</p> <ul style="list-style-type: none"> I can read words, look at pictures and watch videos on a website I can explore a website using hyperlinks 	<p>Creating images:</p> <ul style="list-style-type: none"> I can paint with different colours I can paint neatly using undo or eraser tool to correct mistakes I can change the brush size or style for effect <p>Photography:</p> <ul style="list-style-type: none"> I can use a digital still camera to take a picture <p>Audio:</p> <ul style="list-style-type: none"> I can record an audio recording I can play back an audio recording
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<p>Year 2</p>	<p>Programming:</p> <ul style="list-style-type: none"> I can enter a sequence of commands before running them I can correct errors in programs I can predict the outcome of a program by reading the steps <p>Simulations:</p> <ul style="list-style-type: none"> I can explore a computer simulation that copies real life 	<p>Databases:</p> <ul style="list-style-type: none"> I can read and use a simple database to find information I can add information to a database 	<p>Word processing:</p> <ul style="list-style-type: none"> I can edit and improve my work by changing, adding or removing words I can change the font size, colour and style to change my work 	<p>Research:</p> <ul style="list-style-type: none"> I can find out facts by navigating websites I know each website has a unique address I can navigate to a website via favourites and typing in address I know not all the information found on the internet will be accurate I can use a search engine to find facts using key word search I know what to do if I find something inappropriate online 	<p>Creating images:</p> <ul style="list-style-type: none"> I can draw shapes in different colours to make a picture I can fill shapes with colour <p>Photography:</p> <ul style="list-style-type: none"> I understand the need to frame the image and keep the camera still I can discuss the quality of my image and make decisions e.g. delete a blurred image <p>Video:</p> <ul style="list-style-type: none"> I can record a video recording I understand the need to frame the image and move the camera carefully I can play back a video recording
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<p>Year 3</p>	<p>Programming:</p> <ul style="list-style-type: none"> • I can reorder a sequence of instructions to perform a given task • I can refine a program by using the repeat command <p>Simulations:</p> <ul style="list-style-type: none"> • I can explain how to control a simulation • I can explain how a simulation is and isn't realistic 	<p>Databases:</p> <ul style="list-style-type: none"> • I can create a branching database to sort and organise items • I can filter and sort records in a database to answer questions 	<p>Word processing:</p> <ul style="list-style-type: none"> • I can use cut, copy and paste to reorder content • I can use and resize graphics within my work • I can use spell check to aid my writing <p>Presentations:</p> <ul style="list-style-type: none"> • I can type text and insert images onto pages • I can add text effects and move items around to find the best layout • <p>Online collaboration:</p> <ul style="list-style-type: none"> • I can send and reply to online messages such as email • I can add and open attachments • I know not to open messages and attachments from strangers 	<p>Research:</p> <ul style="list-style-type: none"> • I can search safely online for images and information 	<p>Creating images:</p> <ul style="list-style-type: none"> • I can zoom in to help paint a realistic picture <p>Video:</p> <ul style="list-style-type: none"> • I can zoom in and out on subjects appropriately • I can download the video files from the video camera • I can combine video clips to create a video <p>Audio:</p> <ul style="list-style-type: none"> • I can re-record an audio recording to improve clarity • I can download and save a recording
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<p>Year 4</p>	<p>Programming:</p> <ul style="list-style-type: none"> • I can test existing programs to see how they could be improved • I can create a procedure (group of commands) to do a specific task • I can sequence commands to create a program with a purpose using inputs 	<p>Graphs:</p> <ul style="list-style-type: none"> • I can present data in a graph, selecting the most appropriate layout • I understand the difference between discrete and continuous data • I can answer questions relating to graphs, and pose my own questions • I can use my graph in a document / presentation to share findings with others <p>Spreadsheets:</p> <ul style="list-style-type: none"> • I can add text and numbers to spreadsheet cells • I can add simple formulae: +-* / • I can change the appearance of cells, e.g. size, borders and colours • I can copy and paste formulae within a spreadsheet 	<p>Word processing:</p> <ul style="list-style-type: none"> • I can use different layouts and effects (such as text box, columns, tables, justification, borders, background colour) to refine and improve my work <p>Presentations:</p> <ul style="list-style-type: none"> • I can add a background colour to improve my work • I can add slide transitions and animation effects <p>Online collaboration:</p> <ul style="list-style-type: none"> • I know what spam is, and how to deal with it • I know how and why to keep my personal information private 	<p>Research:</p> <ul style="list-style-type: none"> • I can use more complex search criteria to narrow down my search • I can describe how search results are ranked • I know that not all websites are accurate and can check information using a different site • I can make notes from information found on websites to present my findings 	<p>Creating images:</p> <ul style="list-style-type: none"> • I can group, copy and move shapes within a picture • I can order shapes / images by sending them to the back / front <p>Photography:</p> <ul style="list-style-type: none"> • I can crop and / or rotate an image where needed • I can adjust the colours on a photo <p>Animation:</p> <ul style="list-style-type: none"> • I can plan an animation using a storyboard • I can shoot frames to combine into an animation • I can edit an animation to improve it / make it more realistic • I can put sounds over an animation • I can add titles and photos into an animation • I can plan and create an animation for a given purpose • I can combine an animation with other software <p>Audio:</p> <ul style="list-style-type: none"> • I can edit an audio recording for a purpose • I can add an audio recording to other software
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<p>Year 5</p>	<p>Programming:</p> <ul style="list-style-type: none"> • I can plan and test my algorithms and programs, detecting and correcting errors as needed • I can explore the use of variables • I can design and write a program that controls or simulates physical systems and sensors 	<p>Databases:</p> <ul style="list-style-type: none"> • I can interrogate a database using more complex searches • I can design and create a database • I can use information in a database to create a graph in order to answer questions <p>Spreadsheets:</p> <ul style="list-style-type: none"> • I can use simple functions, e.g. SUM, AVERAGE, to solve problems • I can use brackets to organise formulae • I can change data in a formula to answer 'What if?' questions • I can change the format of cells appropriately • I can create a graph using spreadsheet data 	<p>Word processing:</p> <ul style="list-style-type: none"> • I can develop consistency across the document <p>Presentations:</p> <ul style="list-style-type: none"> • I can add multimedia elements, e.g. sounds, animation • I can trigger animations or link to other slides when objects are pressed <p>Online collaboration:</p> <ul style="list-style-type: none"> • I can display myself appropriately online, e.g. avatar, code name • I can add comments / posts appropriately to online communication e.g. a blog • I understand that information I put online leaves a trail, or digital footprint 	<p>Research:</p> <ul style="list-style-type: none"> • I know the information found on some sites will be biased. • I know that images and text found on websites is subject to copyright • I know how to credit the use of websites in my work, and why this should be done • I know different ways of reporting concerns about content 	<p>Creating images:</p> <ul style="list-style-type: none"> • I can add and combine shapes to design a 3D model • I can add detail to my 3D model <p>Photography:</p> <ul style="list-style-type: none"> • I can improve a photo with editing tools e.g. blur, filters, add border <p>Video:</p> <ul style="list-style-type: none"> • I can edit the video; trimming and re-ordering clips • I can add a voice-over and / or background music to a video • I can add titles to my video <p>Audio:</p> <ul style="list-style-type: none"> • I can create an audio recording and add it to other software
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<p>Year 6</p>	<p>Programming:</p> <ul style="list-style-type: none"> • I can test, debug and modify a program to improve it • I can design and create a game / app incorporating variables 	<p>Spreadsheets:</p> <ul style="list-style-type: none"> • I can design and create a spreadsheet for a specific purpose 	<p>Word processing:</p> <ul style="list-style-type: none"> • I can discuss and evaluate my documents, and make amendments as needed <p>Presentations:</p> <ul style="list-style-type: none"> • I can create a consistent design for my presentation, and present to others <p>Online collaboration:</p> <ul style="list-style-type: none"> • I know that some websites have age restrictions, and why these might be in place • I can describe the opportunities computer networks and the internet offer for communication and collaboration • I know different ways to report concerns about content and contact 	<p>Research:</p> <ul style="list-style-type: none"> • I understand how computer networks work, including the internet • I understand how networks can provide multiple services, such as the web 	<p>Photography:</p> <ul style="list-style-type: none"> • I can take photos for a given purpose and use them in my work <p>Animation:</p> <ul style="list-style-type: none"> • I can plan an animation using a storyboard • I can shoot frames to combine into an animation • I can edit an animation to improve it / make it more realistic • I can put sounds over an animation • I can add titles and photos into an animation • I can plan and create an animation for a given purpose • I can combine an animation with other software <p>Multimedia overall:</p> <ul style="list-style-type: none"> • I can select and use appropriate multimedia tools, and combine these for a given purpose with confidence
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