



St Levan Computing Progression - ESafety Objectives

	EYFS	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
1. Self-Image and Identity	<p>ELG Self-confidence and self-awareness:</p> <ul style="list-style-type: none"> children are confident to try new activities and say why they like some activities more than others. They are confident to speak in a familiar group, will talk about their ideas, and will choose the resources they need for their chosen activities. They say when they do or don't need help. 	<ul style="list-style-type: none"> I can recognise that there may be people online who could make me feel sad, embarrassed or upset. If something happens that makes me feel sad, worried, uncomfortable or frightened I can give examples of when and how to speak to an adult I can trust. 	<ul style="list-style-type: none"> I can explain how other people's identity online can be different to their identity in real life. I can describe ways in which people might make themselves look different online. I can give examples of issues online that might make me feel sad, worried, uncomfortable or frightened; I can give examples of how I might get help. 	<ul style="list-style-type: none"> I can explain what is meant by the term 'identity'. I can explain how I can represent myself in different ways online. I can explain ways in which and why I might change my identity depending on what I am doing online (e.g. gaming; using an avatar; social media). 	<ul style="list-style-type: none"> I can explain how my online identity can be different to the identity I present in 'real life'. Knowing this, I can describe the right decisions about how I interact with others and how others perceive me. 	<ul style="list-style-type: none"> I can explain how identity online can be copied, modified or altered. I can demonstrate responsible choices about my online identity, depending on context. 	<ul style="list-style-type: none"> I can describe ways in which media can shape ideas about gender. I can identify messages about gender roles and make judgements based on them. I can challenge and explain why it is important to reject inappropriate messages about gender online. I can describe issues online that might make me or others feel sad, worried, uncomfortable or frightened. I know and can give examples of how I might get help, both on and offline. I can explain why I should keep asking until I get the help I need.

2. Online Relationships

<p>ELG Managing feelings and behaviour:</p> <ul style="list-style-type: none"> • children talk about how they and others show feelings, talk about their own and others' behaviour, and its consequences, and know that some behaviour is unacceptable. • They work as part of a group or class and understand and follow the rules. • They adjust their behaviour to different situations and take changes of routine in their stride 	<ul style="list-style-type: none"> • I can use the internet with adult support to communicate with people I know. • I can explain why it is important to be considerate and kind to people online. 	<ul style="list-style-type: none"> • I can use the internet to communicate with people I don't know well (e.g. email a penpal in another school/ country). • I can give examples of how I might use technology to communicate with others I don't know well. 	<ul style="list-style-type: none"> • I can describe ways people who have similar likes and interests can get together online. • I can give examples of technology specific forms of communication (e.g. emojis, acronyms, text speak). • I can explain some risks of communicating online with others I don't know well. • I can explain why I should be careful who I trust online and what information I can trust them with. • I can explain how my and other people's feelings can be hurt by what is said or written online. • I can explain why I can take back my trust in someone or something if I feel nervous, uncomfortable or worried. • I can explain what it means to 'know someone' online and why this might be different from knowing someone in real life. • I can explain what is meant by 'trusting someone online'. I can explain why this is different from 'liking someone online'. 	<ul style="list-style-type: none"> • I can describe strategies for safe and fun experiences in a range of online social environments. • I can give examples of how to be respectful to others online. 	<ul style="list-style-type: none"> • I can explain that there are some people I communicate with online who may want to do me or my friends harm. I can recognise that this is not my/our fault. • I can make positive contributions and be part of online communities. • I can describe some of the communities in which I am involved and describe how I collaborate with others positively. 	<ul style="list-style-type: none"> • I can show I understand my responsibilities for the well-being of others in my online social group. • I can explain how impulsive and rash communications online may cause problems (e.g. flaming, content produced in live streaming). • I can demonstrate how I would support others (including those who are having difficulties) online. • I can demonstrate ways of reporting problems online for both myself and my friends.
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3. Online Reputation

- I can recognise that information can stay online and could be copied.
- I can describe what information I should not put online without asking a trusted adult first.

- I can explain how information put online about me can last for a long time.
- I know who to talk to if I think someone has made a mistake about putting something online.

- I can search for information about myself online.
- I can recognize I need to be careful before I share anything about myself or others online.
- I know who I should ask if I am not sure if I should put something online.

- I can describe how others can find out information about me by looking online.
- I can explain ways that some of the information about me online could have been created, copied or shared by others.

- I can search for information about an individual online and create a summary report of the information I find.
- I can describe ways that information about people online can be used by others to make judgments about an individual.

- I can explain how I am developing an online reputation which will allow other people to form an opinion of me.
- I can describe some simple ways that help build a positive online reputation.

4. Online Bullying

- I can describe how to behave online in ways that do not upset others and can give examples.

- I can give examples of bullying behaviour and how it could look online.

- I understand how bullying can make someone feel.

- I can talk about how someone can/would get help about being bullied online or offline.

- I can explain what bullying is and can describe how people may bully others.

I can describe rules about how to behave online and how I follow them.

- I can identify some online technologies where bullying might take place.

- I can describe ways people can be bullied through a range of media (e.g. image, video, text, **chat**).

I can explain why I need to think carefully about how content I post might affect others, their feelings and how it may affect how others feel about them (their reputation).

- I can recognise when someone is upset, hurt or angry online.

- I can describe how to get help for someone that is being bullied online and assess when I need to do or say something or tell someone.

- I can explain how to block abusive users.

- I can explain how I would report online bullying on the apps and platforms that I use.

I can describe the helpline services who can support me and what I would say and do if I needed their help (e.g. **Childline**).

- I can describe how to capture bullying content as evidence (e.g **screen-grab**, **URL**, **profile**) to share with others who can help me.

- I can identify a range of ways to report concerns both in school and at home about online bullying.

5. Managing Online Information

		<ul style="list-style-type: none"> • I can use the internet to find things out. • I can use simple keywords in search engines. • I can describe and demonstrate how to get help from a trusted adult or helpline if I find content that makes me feel sad, uncomfortable worried or frightened. 	<ul style="list-style-type: none"> • I can use keywords in search engines. • I can demonstrate how to navigate a simple webpage to get to information I need (e.g. home, forward, back buttons; links, tabs and sections). • I can explain what voice activated searching is and how it might be used (e.g. Alexa, Google Now, Siri). • I can explain the difference between things that are imaginary, 'made up' or 'make believe' and things that are 'true' or 'real'. • I can explain why some information I find online may not be true. 	<ul style="list-style-type: none"> • I can use key phrases in search engines. • I can explain what autocomplete is and how to choose the best suggestion. • I can explain how the internet can be used to sell and buy things. • I can explain the difference between a 'belief', an 'opinion' and a 'fact'. 	<ul style="list-style-type: none"> • I can analyse information and differentiate between 'opinions', 'beliefs' and 'facts'. I understand what criteria have to be met before something is a 'fact'. • I can describe how I can search for information within a wide group of technologies (e.g. social media, image sites, video sites). • I can describe some of the methods used to encourage people to buy things online (e.g. advertising offers; in-app purchases, pop-ups) and can recognise some of these when they appear online. • I can explain that some people I 'meet online' (e.g. through social media) may be computer programmes pretending to be real people. <p>I can explain why lots of people sharing the same opinions or beliefs online does not make those opinions or beliefs true.</p>	<ul style="list-style-type: none"> • I can use different search technologies. • I can evaluate digital content and can explain how I make choices from search results. • I can explain key concepts including: data, information, fact, opinion belief, true, false, valid, reliable and evidence. • I understand the difference between online mis-information (inaccurate information distributed by accident) and dis-information (inaccurate information deliberately distributed and intended to mislead). • I can explain what is meant by 'being sceptical'. I can give examples of when and why it is important to be 'sceptical'. • I can explain what is meant by a 'hoax'. I can explain why I need to think carefully before I forward anything online. • I can explain why some information I find online may not be honest, accurate or legal. 	<ul style="list-style-type: none"> • I can use search technologies effectively. • I can explain how search engines work and how results are selected and ranked. • I can demonstrate the strategies I would apply to be discerning in evaluating digital content. • I can describe how some online information can be opinion and can offer examples. • I can explain how and why some people may present 'opinions' as 'facts'. • I can define the terms 'influence', 'manipulation' and 'persuasion' and explain how I might encounter these online (e.g. advertising and 'ad targeting'). • I can demonstrate strategies to enable me to analyse and evaluate the validity of 'facts' and I can explain why using these strategies are important. • I can identify, flag and report inappropriate content.
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						<ul style="list-style-type: none"> • I can explain why information that is on a large number of sites may still be inaccurate or untrue. I can assess how this might happen (e.g. the sharing of misinformation either by accident or on purpose). 	
6. Health, Wellbeing and Lifestyle		<ul style="list-style-type: none"> • I can identify rules that help keep us safe and healthy in and beyond the home when using technology. • I can explain rules to keep us safe when we are using technology both in and beyond the home. • I can give examples of some of these rules. 	<ul style="list-style-type: none"> • I can explain simple guidance for using technology in different environments and settings. • I can say how those rules/guides can help me. 	<ul style="list-style-type: none"> • I can explain why spending too much time using technology can sometimes have a negative impact on me; I can give some examples of activities where it is easy to spend a lot of time engaged (e.g. games, films, videos). 	<ul style="list-style-type: none"> • I can explain how using technology can distract me from other things I might do or should be doing. • I can identify times or situations when I might need to limit the amount of time I use technology. • I can suggest strategies to help me limit this time. 	<ul style="list-style-type: none"> • I can describe ways technology can affect healthy sleep and can describe some of the issues. • I can describe some strategies, tips or advice to promote healthy sleep with regards to technology. 	<ul style="list-style-type: none"> • I can describe common systems that regulate age-related content (e.g. PEGI, BBFC, parental warnings) and describe their purpose. • I can assess and action different strategies to limit the impact of technology on my health (e.g. night-shift mode, regular breaks, correct posture, sleep, diet and exercise). • I can explain the importance of self-regulating my use of technology; I can demonstrate the strategies I use to do this (e.g. monitoring my time online, avoiding accidents).

7. Privacy and Security

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| | <ul style="list-style-type: none"> • I can recognise more detailed examples of information that is personal to me (e.g. where I live, my family's names, where I go to school). • I can explain why I should always ask a trusted adult before I share any information about myself online. • I can explain how passwords can be used to protect information and devices. | <ul style="list-style-type: none"> • I can describe how online information about me could be seen by others. • I can describe and explain some rules for keeping my information private. • I can explain what passwords are and can use passwords for my accounts and devices. • I can explain how many devices in my home could be connected to the internet and can list some of those devices. | <ul style="list-style-type: none"> • I can give reasons why I should only share information with people I choose to and can trust. I can explain that if I am not sure or I feel pressured, I should ask a trusted adult. • I understand and can give reasons why passwords are important. • I can describe simple strategies for creating and keeping passwords private. • I can describe how connected devices can collect and share my information with others. | <ul style="list-style-type: none"> • I can explain what a strong password is. • I can describe strategies for keeping my personal information private, depending on context. • I can explain that others online can pretend to be me or other people, including my friends. • I can suggest reasons why they might do this. • I can explain how internet use can be monitored. | <ul style="list-style-type: none"> • I can create and use strong and secure passwords. • I can explain how many free apps or services may read and share my private information (e.g. friends, contacts, likes, images, videos, voice, messages, geolocation) with others. • I can explain how and why some apps may request or take payment for additional content (e.g. in-app purchases) and explain why I should seek permission from a trusted adult before purchasing. | <ul style="list-style-type: none"> • I use different passwords for a range of online services. • I can describe effective strategies for managing those passwords (e.g. password managers, acronyms, stories). • I know what to do if my password is lost or stolen. • I can explain what app permissions are and can give some examples from the technology or services I use. • I can describe simple ways to increase privacy on apps and services that provide privacy settings. • I can describe ways in which some online content targets people to gain money or information illegally; I can describe strategies to help me identify such content (e.g. scams, phishing). |
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8. Copyright and Ownership

- I can explain why work I create using technology belongs to me.
- I can say why it belongs to me (e.g. 'it is my idea' or 'I designed it').
- I can save my work so that others know it belongs to me (e.g. filename, name on content).

- I can describe why other people's work belongs to them.
- I can recognise that content on the internet may belong to other people.

- I can explain why copying someone else's work from the internet without permission can cause problems.
- I can give examples of what those problems might be.

- When searching on the internet for content to use, I can explain why I need to consider who owns it and whether I have the right to reuse it.
- I can give some simple examples.

- I can assess and justify when it is acceptable to use the work of others.
- I can give examples of content that is permitted to be reused.

- I can demonstrate the use of search tools to find and access online content which can be reused by others.
- I can demonstrate how to make references to and acknowledge sources I have used from the internet.



St Levan Computing Progression – Curriculum Objectives EYFS and KS1

	EYFS	Year 1	Year 2
Key Skills		<ul style="list-style-type: none"> • to know how to switch a range of digital devices (computer/iPad) on and off • load programs (office, iPad apps,) with support/open and close apps • use a mouse to navigate an age-appropriate website/know how to navigate apps on an iPad • -use a mouse to select/drag/position an object or window • to talk about what they are doing with Computers/Digital Media using appropriate vocabulary according to equipment available e.g screen/keyboard/iPad/computer/mouse/headphones 	<ul style="list-style-type: none"> • to develop awareness of keyboard layout and use of a mouse e.g use the mouse or arrow keys to insert words and sentences • know backspace/undo/ • shift for capital letters/enter/upload • changing font/ size/colour and style of text. • typing skills (use two hands when typing) • logging on/off digital devices • use navigation skills to access appropriate parts of a website/ simple program/ app
Information Technology <ul style="list-style-type: none"> • use technology purposefully to create, organise, store, manipulate and retrieve digital content • recognise common uses of information technology beyond school 	<p>ELG People and communities:</p> <ul style="list-style-type: none"> • children talk about past and present events in their own lives and in the lives of family members. • They know that other children don't always enjoy the same things and are sensitive to this. • They know about similarities and differences between themselves and others, and among families, communities and traditions. <p>ELG Technology:</p> <ul style="list-style-type: none"> • children recognise that a range of technology is used in places such as homes and schools. 	<ul style="list-style-type: none"> • to know how to switch a range of digital devices (computer/iPad) on and off • load programs (office, iPad apps,) with support/open and close apps • use a mouse to navigate an age-appropriate website/know how to navigate apps on an iPad • -use a mouse to select/drag/position an object or window • to talk about what they are doing with Computers/Digital Media using appropriate vocabulary according to equipment available e.g screen/keyboard/iPad/computer/mouse/headphones 	<ul style="list-style-type: none"> • to develop awareness of keyboard layout and use of a mouse e.g use the mouse or arrow keys to insert words and sentences • know backspace/undo/ • shift for capital letters/enter/upload • changing font/ size/colour and style of text. • typing skills (use two hands when typing) • logging on/off digital devices • use navigation skills to access appropriate parts of a website/ simple program/ app

	<ul style="list-style-type: none"> • They select and use technology for particular purposes. 		
Digital Literacy <ul style="list-style-type: none"> • use technology safely and respectfully, keeping personal information private • identify where to go for help and support when they have concerns about content or contact on the internet or other online technologies 	<p>ELG Exploring and using media and materials:</p> <ul style="list-style-type: none"> • children sing songs, make music and dance, and experiment with ways of changing them. • They safely use and explore a variety of materials, tools and techniques, experimenting with colour, design, texture, form and function. <p>ELG Being imaginative:</p> <ul style="list-style-type: none"> • children use what they have learnt about media and materials in original ways, thinking about uses and purposes. • They represent their own ideas, thoughts and feelings through design and technology, art, music, dance, role-play and stories. 	<ul style="list-style-type: none"> • to know how to switch a range of digital devices (computer/iPad) on and off • load programs (office, iPad apps,) with support/open and close apps • use a mouse to navigate an age-appropriate website/know how to navigate apps on an iPad • -use a mouse to select/drag/position an object or window • to talk about what they are doing with Computers/Digital Media using appropriate vocabulary according to equipment available e.g screen/keyboard/iPad/computer/mouse/headphones 	<ul style="list-style-type: none"> • to develop awareness of keyboard layout and use of a mouse e.g use the mouse or arrow keys to insert words and sentences • know backspace/undo/ • shift for capital letters/enter/upload • changing font/ size/colour and style of text. • typing skills (use two hands when typing) • logging on/off digital devices • use navigation skills to access appropriate parts of a website/ simple program/ app
			<ul style="list-style-type: none"> • to know that people we don't know are strangers and are not always who they say they are • to be nice to people on the computer as well as on the playground • to know that some information is personal and needs to be kept private • to know who to tell if something is seen that makes them feel uncomfortable • to know that passwords are used to access certain sites • to begin to use an appropriate search engine (safesearch) supported by an adult

<p>Computer Science</p> <ul style="list-style-type: none"> • understand what algorithms are; how they are implemented as programs on digital devices; and that programs execute by following precise and unambiguous instructions • create and debug simple programs • use logical reasoning to predict the behaviour of simple programs 	<p>ELG Understanding:</p> <ul style="list-style-type: none"> • children follow instructions involving several ideas or actions. • They answer ‘how’ and ‘why’ questions about their experiences and in response to stories or events. <p>ELG Moving and handling:</p> <ul style="list-style-type: none"> • children show good control and co-ordination in large and small movements. • They move confidently in a range of ways, safely negotiating space. 	<ul style="list-style-type: none"> • to know how to switch a range of digital devices (computer/iPad) on and off • load programs (office, iPad apps,) with support/open and close apps • use a mouse to navigate an age-appropriate website/know how to navigate apps on an iPad • -use a mouse to select/drag/position an object or window • to talk about what they are doing with Computers/Digital Media using appropriate vocabulary according to equipment available e.g screen/keyboard/iPad/computer/mouse/headphones 	<ul style="list-style-type: none"> • to develop awareness of keyboard layout and use of a mouse e.g use the mouse or arrow keys to insert words and sentences • know backspace/undo/ • shift for capital letters/enter/upload • changing font/ size/colour and style of text. • typing skills (use two hands when typing) • logging on/off digital devices • use navigation skills to access appropriate parts of a website/ simple program/ app
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St Levan Computing Progression – Curriculum Objectives KS2

	Year 3	Year 4	Year 5/Year 6
Key Skills	<ul style="list-style-type: none"> • to upload from digital devices and the Internet to a shared space (Class folders/Chn's Folder) • to know that they can access their work from any school computer by logging on to their Folder/Network Area. • open/edit and save their work in own space • to insert/cut/ copy/paste • use ctrl+v and ctrl+c to copy and paste • to use 'save as' to create another version of their work • to develop further basic drafting skills : • Insert words or sentences. • Centre titles. • Change font, font size, colour. • to practice touch typing (typingclub) 	<ul style="list-style-type: none"> • To use the online dictionary/thesaurus • to use ctrl+alt+prntscrn to take a picture of the whole screen and paste it into paint to adapt it. • to use the cropping tool to take a picture of any part of the screen, drawing before annotating the image and saving it. • Use windows snipping tool to capture and annotate work • continue to practice touch typing (touchtype - 20 WPM by end of Year 4) • Use more than two fingers to type • to develop further basic drafting and editing skills • Edit and top copy literacy work using Word/PPT/Publisher • use spell checker • delete, insert and replace text using mouse or arrow keys 	<ul style="list-style-type: none"> • to be able to use an online dictionary/thesaurus to search out level specific grammar and vocabulary independently • to use a variety of techniques to save and annotate on screen projects (screenshots/snipping) • to find, save, crop and edit images to suit needs of projects • continue to practice touch typing (touchtype – use several fingers and maintain 25-30 WPM) • to select suitable software to edit and redraft written work • edit and top copy literacy work using Word/PPT/Publisher use spellchecker and grammar checker to ensure consistency throughout work • use a variety of keyboard shortcuts to improve efficiency on computing systems
Information Technology <ul style="list-style-type: none"> • understand computer networks including the internet; how they can provide multiple services, such as the world wide web; and the opportunities they offer for communication and collaboration 	<ul style="list-style-type: none"> • to use still and digital cameras • to know what makes a good photo (hold the ipad steady/point at people's faces/to discuss the quality of their image and make decisions (e.g delete a blurred / bad image) • to download stills and video • select suitable sounds (including recording with a microphone) • recognise and use key features of layout and design such as text boxes, columns, borders, WordArt 	<ul style="list-style-type: none"> • to evaluate a range of digital media, appropriate to task e.g website, photostory, leaflet, and recognise key features of layout and design • to plan structure and layout of document/presentation • to improve presentation of a document by laying it out effectively • to select and import graphics from digital cameras and graphics packages • select and import sounds (eg own recording, sound effects bank created by teacher) and video/ visual effects 	<ul style="list-style-type: none"> • To use presentation software and skills to present work or information relating to their learning (once a half term – PPT/slides/keynote/prezi). • to evaluate a range of digital media, appropriate to task e.g website, prezi, blog, pdfs and recognise key features of layout and design and relate to other curriculum areas (Reading/Writing/Topic) • to select software to support structure and layout of document/presentation • to improve presentation of a document by considering its target audience • to select and import graphics from digital cameras, graphics packages and online sources and edit/recolour/or add visual effects • select and import sounds (eg own recording, free online sources) video/visual effects

<p>use search technologies effectively, appreciate how results are selected and ranked, and be discerning in evaluating digital content</p>	<ul style="list-style-type: none"> • explore and begin to use more advanced features in a paint package, eg colour picker, colour replacer • save images and use them as part of other multimedia/ desktop publishing work • to use music software to select/record/organise and reorganise sounds • to create tunes with a beginning, middle and end (iPad apps) • to locate, record, save and retrieve sounds • to begin to layer sounds using music composition software • to add sounds from different sources. • sequence still images and use simple editing techniques to create a presentation 	<ul style="list-style-type: none"> • through peer assessment and self-evaluation, evaluate work both during and after completion, and make suitable improvements • to develop an increasing awareness of intended audience. • to import a photograph and explore the effects which can be created • to select areas and manipulate to give different effects. • to capture video clips to communicate their ideas • to cut and reorganise digital video • to use a timeline to organise frames of video footage • to add text, sound effects and other graphic effects • to use an on-screen animation package or digital camera with stop-frame animation software, to create an animation • to select from your best work to save and share through an e-portfolio (purple mash display board) • to use at least two online communication methods in topic work (blogs/emails/padlet/weebly/forms/docs) • to discuss advantages and disadvantages of these communication methods • to start to think about the different styles of language layout and format of online communications sent to different people (eg. when it is appropriate to use “text language”). • to begin to experience forms of online discussion: such as blogs, wikis, quizzes, docs, surveys and google hangouts 	<ul style="list-style-type: none"> • through peer assessment and self-evaluation, evaluate projects both during and after completion, and make suitable improvements • to develop projects with an awareness of intended audience • to capture video clips to communicate ideas and information to specific audiences • to edit, reorganize and enhance digital video for a specific purpose or audience • to produce a portfolio of written and visual work and projects for sharing with other children inside and out of school • to use online communication methods to support topic work • to consider language, layout and format when communicating with different people online <p>to engage in a range of online activities including; publishing and sharing work for evaluation and evaluating the work of others.</p>
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		<ul style="list-style-type: none"> • start new threads and contribute to others relevant to the topic; consider relevance of contributions 	
Digital Literacy <ul style="list-style-type: none"> • select, use and combine a variety of software (including internet services) on a range of digital devices to design and create a range of programs, systems and content that accomplish given goals, including collecting, analysing, evaluating and presenting data and information use technology safely, respectfully and responsibly; recognise acceptable/unacceptable behaviour; identify a range of ways to report concerns about content and contact. 	<ul style="list-style-type: none"> • to evaluate a range of printed and electronic texts, appropriate to task e.g. newspaper, poster, webpage and recognise key features of layout and design • to organise and present information for a specific audience • to begin to experience forms of online discussion: such as blogs, wikis, quizzes, surveys and google hangouts • to know that ICT enables access to a wider range of information and tools to help find specific information quickly • produce work using a computer, using more advanced features of programs and tools (font sizes) • to work collaboratively to create documents, including presentations • to create record cards to store collected information • to understand the basic structure of a database • to add data to a pre-made database • to use the data in a pre-made database to generate graphs and charts • to use technology to create graphs and charts to answer questions by searching and sorting the database 	<ul style="list-style-type: none"> • to open/read, and reply to email • to collaborate to create a document, giving thought to its audience and including links/images/embedded media (PPT/Weebly) • to understand that ICT allows us to make improvements to our work quickly and efficiently. • to continue to use technology to create graphs and present data in different ways. • to design and create a basic database • to use a database to answer questions that have been constructed • to explore some real-life examples of branching databases, such as keys for animal identification • to enter data into a spreadsheet • to change data and observe changes in results • 	<ul style="list-style-type: none"> • Use technology to present their work, showing an increasing degree of skill and using advanced software • to use different filming techniques and camera angles e.g. zoom, panning, wide shot etc. to create different mood/perspective • to plan a video or animation by drawing a storyboard (Storyboard It) • to use a range of sound effects, music and voice-overs to create mood/atmosphere • to select and edit sounds, text, movie clips and other effects to suit purpose and audience • use a range of sources to check validity and recognise different viewpoints and the impact of incorrect data • save and use pictures, text and sound recognising copyright issues • recognise that the internet may contain material that is irrelevant, bias and inappropriate. • Understand how issues of copyright apply to their own work • Understand the different type of copyright pertaining to digital medias • exchange ideas using electronic communication (Padlet, Google Docs and Forms, Websites) inside the school community • collaborate with other children outside of school • Develop understanding of how technology works; how computers process instructions and commands, including the use of coding languages. • To experience a variety of coding environments (Scratch, Code.org, KODU, Python) • begin to understand the history of Computer Science • to design their own game including sprites, backgrounds, scoring and/or timers. • use conditional statements to create unique algorithms • Use variables to add variation to algorithms • to program start and ends to games involving wins, losses and draws • to create variable interaction in quizzes and games using a combination of selection, conditional statements and variables (Data blocks in scratch) • to evaluate the effectiveness of their algorithms

			<ul style="list-style-type: none">• To continually debug code to identify and correct errors, exceptions and exploits• To show an understanding of the history of computing and computer science.
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<p>Computer Science</p> <ul style="list-style-type: none"> • design, write and debug programs that accomplish specific goals, including controlling or simulating physical systems; solve problems by decomposing them into smaller parts • use sequence, selection, and repetition in programs; work with variables and various forms of input and output • use logical reasoning to explain how some simple algorithms work and to detect and correct errors in algorithms and programs 	<ul style="list-style-type: none"> • to develop an understanding of how technology works and how computers process instructions and commands. • To create/edit and refine more complex sequences of instructions for a variety of programmable devices e.g using the repeat command • To use a computer to create basic applications, investigating how different variables can be changed and the effect this has • to understand that computer simulations can represent real life situations. • to use simulations to represent real life situations • to navigate a programming app • to control a character by dragging commands • to write a simple program/create a simple animation 	<ul style="list-style-type: none"> • to understand that ICT allows for situations to be modelled which it would be impractical to try out in real life • to investigate the effects of changing variables in these simulations • To develop their understanding of how technology works and how computers process instructions and commands • to create a program which can be controlled by external inputs (Scratch/BeeBot Pro) e.g to program their character to navigate their 3D world with an input/move a BeeBot with using control device • To change algorithms/conditional statements and investigate the effect this has e.g use of 'if' and 'then' • to identify how different web pages are organised e.g graphics/hyperlinks/text • to understand that a website has a unique address • to understand that cloud based tools can allow multiple people to contribute to shared documents and sites 	
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EYFS	<i>Greater Depth</i>	<i>Greater Depth</i>	<i>Greater Depth</i>	<i>Greater Depth</i>
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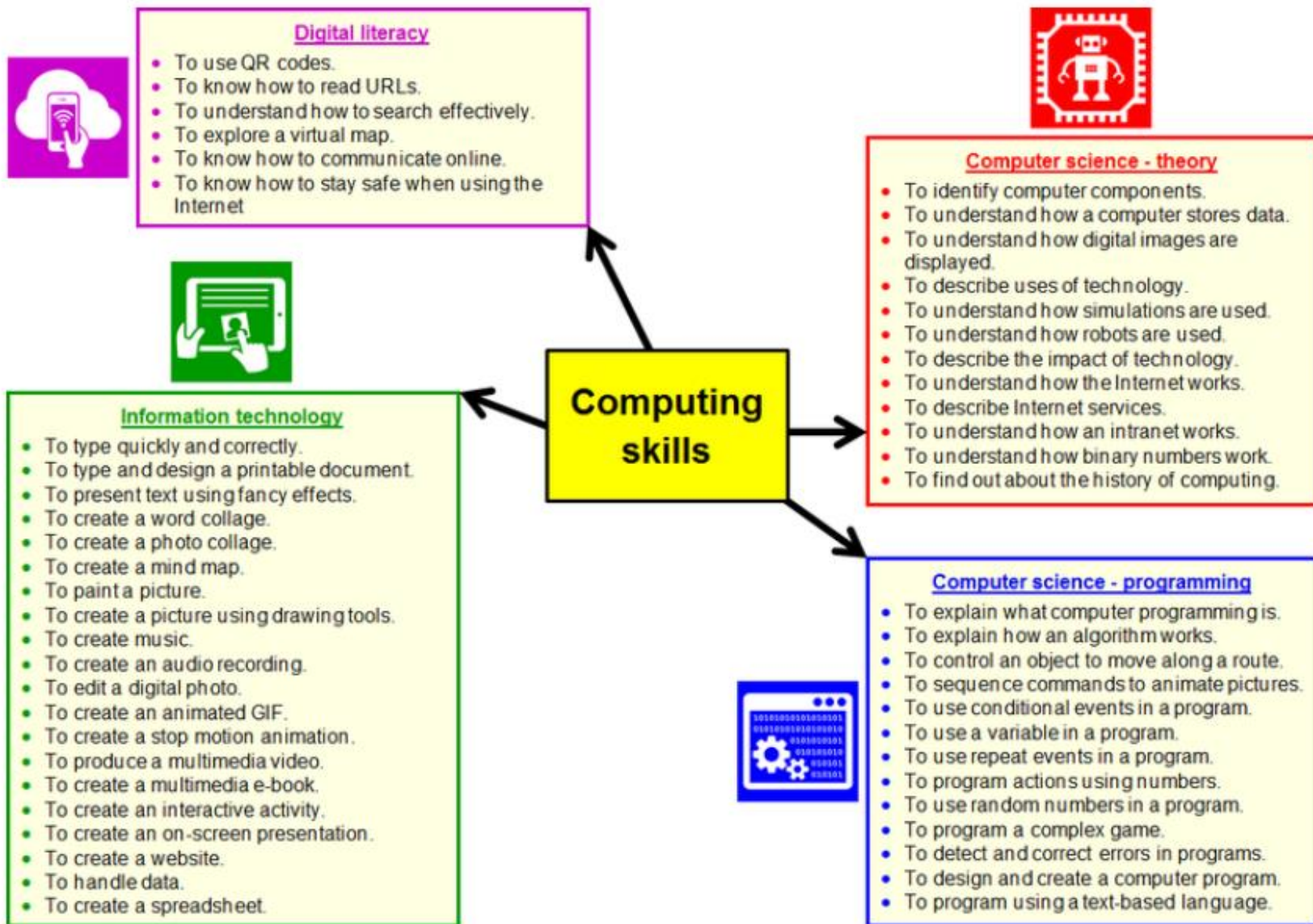
YEAR ONE	<i>Greater Depth</i>	<i>Greater Depth</i>	<i>Greater Depth</i>	<i>Greater Depth</i>
	<ul style="list-style-type: none"> Independently turn on a computer and iPad. Open an app or internet browser in Windows. Confidently use a mouse and trackball to interact with a computer. 	<ul style="list-style-type: none"> Type a sentence with a capital letter and a full stop, independently. Use a range of digital devices confidently to take pictures, video and record sounds. 	<ul style="list-style-type: none"> Create and edit age specific writing and visual content using Word Processing software (Word, Powerpoint, Purple-Mash) independently. Enter a shortened goo.gl link independently. To use links on a webpage to navigate. To be able to explain what to do if they feel uncomfortable with something online. 	<ul style="list-style-type: none"> To complete missing parts of given code/instructions to solve a problem in a digital environment, independently. (Code.org, ScratchJr/Scratch/purplemash) Use a range of digital devices confidently to complete a predetermined route. (Beebots/DaisyDino/purplemash) To identify where a code or device has gone wrong and suggest a correction.

YEAR TWO	<i>Greater Depth</i>	<i>Greater Depth</i>	<i>Greater Depth</i>	<i>Greater Depth</i>
	<ul style="list-style-type: none"> Type using two hands making use of a wider range of keyboard functions (Arrow keys, Shift, both delete keys, Caps and Num lock etc)) Confident use of mouse to move, select and control on screen content. (Click and drag accurately, right click to access save options) 	<ul style="list-style-type: none"> Can select and use images to enhance work produced using word processing software. (Word/PPT/Pages/Keynote/purplemash) Can select and edit the style of writing in word processing software to improve the overall presentation (font, size, layout etc). Can save work in windows/purplemash folders and retrieve it to add or continue. 	<ul style="list-style-type: none"> To provide comments (positive and constructive) about another person's/child's/teacher's work, in a digital form or environment. To create a goo.gl link or QR code as a way of accessing online work they have created (goo.gl/purplemash/scratch/code.org) 	<ul style="list-style-type: none"> To organise given code/instructions to solve a problem in a digital environment, independently. (Code.org, ScratchJr/Scratch/purplemash) Use a range of digital devices confidently to complete a more complicated predetermined route. (Beebots/DaisyDino/purplemash) To begin to independently debug code and instructions by identifying errors and changing.

	<i>Greater Depth</i>	<i>Greater Depth</i>	<i>Greater Depth</i>	<i>Greater Depth</i>
YEAR THREE	<ul style="list-style-type: none"> • To distinguish between 'save' and 'save as' and use at the appropriate opportunities to aid efficiency. • To confidently navigate windows folders and menus to locate programs and files. • Utilises keyboard shortcuts to copy and paste. 	<ul style="list-style-type: none"> • Begin to create digital media for their own proposes (Images, sound recordings, video etc). • To begin to select images and other media based on its suitability for a specific purpose (choice of colours in images for posters, sounds for animations etc) 	<ul style="list-style-type: none"> • To show familiarity with similar features across different software (saving, opening, closing and navigating) • To independently distinguish between where to enter text in a web browser (address bar/search bar) <hr/> <ul style="list-style-type: none"> • To show awareness of age appropriate e-safety guidelines during work/play involving ICTs 	<ul style="list-style-type: none"> • To code efficiently using repeat functions to duplicate actions and cloning/duplicating long sections of code or code for similar functions. • Begin to use conditional statements independently in Scratch to create variation (<i>If...</i> and <i>If, then...</i>)

	<i>Greater Depth</i>	<i>Greater Depth</i>	<i>Greater Depth</i>	<i>Greater Depth</i>
YEAR FOUR	<ul style="list-style-type: none"> • Typing using two hands and more than two fingers at a good pace 20-30 words per minute. • Utilises a range of methods to select and record on screen activity (ctrl+alt+prntscrn, Windows snipping, screenshots etc). 	<ul style="list-style-type: none"> • To select, edit and refine media choices based on evaluations. Basing selections and choices of content and editing upon constructive and critical evaluations. • To independently select and create video, sound and images to support digitally created content or to enhance work collected from other subjects. (Eg: Images/Videos in Science or sound bites/monologues in English or Topic) 	<ul style="list-style-type: none"> • To independently produce work in other curriculum areas using computing elements (researching topic, typing work, recording discussions etc.) • To independently use word processing software to use to create a piece of work (top copy/project/Computing etc). <hr/> <ul style="list-style-type: none"> • To show awareness of age appropriate e-safety guidelines during work/play involving ICTs • To begin to support others with following age appropriate e-safety guidelines 	<ul style="list-style-type: none"> • To confidently use variables (<i>conditional statements</i> and 'ifs') to affect simple code and outcomes of longer algorithms. • To use scratch to create a program (series of code for varied function) to achieve a specified outcome (I want to make a driving game, I will use scratch etc)

YEAR FIVE	Greater Depth	Greater Depth	Greater Depth	Greater Depth
	<ul style="list-style-type: none"> • To independently utilise a range of skills and techniques to organise, type, edit and improve a piece of written work digitally for Top Copy. 	<ul style="list-style-type: none"> • To use presentation software to enhance the delivery of content and information (Clear visuals, which are appropriately sized. Smooth and confident transitions. Use of digital notes if available. Inclusion of embedded media.) • To independently select, edit and refine media choices based on evaluations and audience consideration. • To independently use digital equipment to record video and audio for use in other work. 	<ul style="list-style-type: none"> • To suggest software to produce work in other curriculum areas using computing elements (researching topic, typing work, recording discussions etc.) • To select and independently use word processing software to use to create a piece of work (top copy/project/Computing etc) based on the requirements of the piece. 	<ul style="list-style-type: none"> • To confidently use a variety of variables (Data/unique operators, <i>conditional statements</i> and 'ifs') to affect a variety of code in various ways (input/output/variation) • To be confident in a variety of coding environments (Scratch, Code.org, KODU). • To select and environment to create program (games/animations/stories) to achieve a specific goal.
YEAR SIX	<ul style="list-style-type: none"> • To independently utilise a range of skills and techniques to organise, type, edit and improve a piece of written work digitally for Top Copy, across a variety of software (<i>Word, PPT, Publisher, Docs, PurpleMash, Keynote, Polaris</i>) 	<ul style="list-style-type: none"> • To use presentation software to enhance the delivery of content and information, across a variety of software. (Clear visuals, which are appropriately sized. Smooth and confident transitions. Use of digital notes if available. Inclusion of embedded media) • To continue to independently select, edit and refine media choices based on evaluations and audience consideration. • To independently use a range of digital equipment to record video and audio for use in other work. 	<ul style="list-style-type: none"> • To select software to independently produce work in other curriculum areas using computing elements (researching topic, typing work, recording discussions etc.) • To select and independently use word processing software to use to create a piece of work (top copy/project/Computing etc) utilising specific features to enhance the outcome. 	<ul style="list-style-type: none"> • To confidently use a variety of variables (Data/unique operators, <i>conditional statements</i> and 'ifs') to affect a variety of code in various ways (input/output/variation) • To be confident in using Python to create an outcome based on a specific goal. • <i>To show an understanding of how the history of computing and computer science has contributed to modern standards in computing.</i>
			<ul style="list-style-type: none"> • To show awareness of age appropriate e-safety guidelines at all times. • To support and guide others with age appropriate e-safety guidelines 	



EYFS Progression and what it might look like in the classroom

Strand	Computer Science	Digital Literacy	Information Technology O	Online Safety
Relevant ELGs	<p>ELG Understanding: children follow instructions involving several ideas or actions. They answer 'how' and 'why' questions about their experiences and in response to stories or events. ELG Moving and handling: children show good control and co-ordination in large and small movements. They move confidently in a range of ways, safely negotiating space.</p>	<p>ELG Exploring and using media and materials: children sing songs, make music and dance, and experiment with ways of changing them. They safely use and explore a variety of materials, tools and techniques, experimenting with colour, design, texture, form and function. ELG Being imaginative: children use what they have learnt about media and materials in original ways, thinking about uses and purposes. They represent their own ideas, thoughts and feelings through design and technology, art, music, dance, role-play and stories.</p>	<p>ELG People and communities: children talk about past and present events in their own lives and in the lives of family members. They know that other children don't always enjoy the same things and are sensitive to this. They know about similarities and differences between themselves and others, and among families, communities and traditions. ELG Technology: children recognise that a range of technology is used in places such as homes and schools. They select and use technology for particular purposes.</p>	<p>ELG Self-confidence and self-awareness: children are confident to try new activities and say why they like some activities more than others. They are confident to speak in a familiar group, will talk about their ideas, and will choose the resources they need for their chosen activities. They say when they do or don't need help. ELG Managing feelings and behaviour: children talk about how they and others show feelings, talk about their own and others' behaviour, and its consequences, and know that some behaviour is unacceptable. They work as part of a group or class and understand and follow the rules. They adjust their behaviour to different situations and take changes of routine in their stride.</p>

<p>What might this look like in the EYFS?</p>	<p>Children in Early Years are already immersed in a programmed world. They experience it every day of their lives when:</p> <ul style="list-style-type: none"> • the doors at the supermarket open automatically when they approach, • the hand drier starts when they place their hands underneath • the price of an item shows as you scan • the streetlights come on automatically when it gets dark. <p>In the EYFS, continuous provision draws on these common uses of control technology for children to experience first-hand and to explore their uses through play. Additional experiences might also include: ‘programming’ friends by telling them how to move around like a robot or making jam sandwiches in maths, use of control toys like remote control cars, BeeBots or apps on iPads.</p>	<p>Practitioners will need to support the youngest children as they explore digital apparatus with discussion about what it does, how it works and how to use it safely. Children in Early Years will explore mark making programs on screens, tablets or interactive whiteboard to experiment and communicate their ideas. They will Interact with adults and their peers and explore their environment using multimedia equipment, including cameras, microscopes, iPads and visualisers to capture still and moving images. With help, they will play back their captured recordings, demonstrating confidence and increasingly in control. They will be encouraged to explore ways of making and listening to sounds using simple programs, apps and devices, e.g. talking postcards and age appropriate apps.</p>	<p>Children’s natural curiosity has always driven them to develop an understanding of the world around them and this is no different when it comes to understanding technology; both how it works and what it can do for us. From their first, early experiences with technology, pupils begin to make sense of how it works and the opportunities it can provide. Children’s experiences in this area should include exploring:</p> <ul style="list-style-type: none"> • the technology they encounter at home and school (e.g. role play toys, photocopiers, iPads etc.) • how technology has changed over time and how it differs across cultures by sharing artefacts, photos and videos, and asking others. (Links to history). 	<p>It is important for children to learn to be esafe from an early age. Practitioners and teachers of children in the infant years play a vital part in starting this process and involving parents in recognising their responsibilities just as they do when thinking about other aspects of children’s safety when crossing the road safety, handling potentially dangerous equipment in the home or at the swimming pool. With the very youngest children, many of the key online safety messages will be conveyed through guided use, continuous provision and adult modelling in the school or setting. Additionally, and importantly, this will be alongside and with the involvement of parents and carers at home. Listen to young children talking about their online world and use this overheard talk to engage with them and find out mo</p>
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