Computing Golden Nuggets
Programming

Year 1/2 Cycle B Scented Garden		Year 3/4 Cycle B Might Metals		Year 5/6 Cycle B Stargazers	
• Explore an on screen turtle (or Bee BOT) navigate it around a course or grid • While navigating around a course on a computer predict what will happen once the next command is entered.	• Know that devices and actions on screen may be controlled by sequences of actions and instructions • Create a sequence of instructions to create a right-angled shape on screen	• Explain what an algorithm will do by reading the commands. • Test my algorithm and recognise when to change it • Navigate around Scratch (or similar) • Create a repeat pattern that instructions motions by specifying the number of steps, direction and turn. • Add speech • Make my sprite change colour • Control what my sprite does using specified keys.	• Begin to break algorithms down to solve problems. • Create a list of 5 commands which involve movements and looks. • Use costumes • Use two sprites and two algorithms • Use sound • Begin to use sensing to create a command • Begin to use timings to control movements and speech between characters	• I can predict what will happen when discussing different algorithms, • Understand how breaking things down into different events may make it easier to debug, edit and improve. • Create movements using co-ordinates and rotations (with degrees) • Create drawings using pen shades, directions and angles. • Create an animation with speech and sensing between at least 2 characters. • Use 'IF' to control objects and create variables • Control the sprites movement using the keyboard	• Show logical thinking when creating a complicated algorithm, • Sort algorithms between what will and won't work and explain why by breaking it into smaller parts and explaining why. Test the algorithms to support this. • Starting to find more than 1 way to debug and solve a problem. • Create a story or animation using a range of commands and shows creativity and imagination.
Knowledge: **Skills:** • To be able to move an on-screen turtle/bee-bot around a grid • To use positional language when directing turtle	**Knowledge:** • To know that the on-screen turtles can have a set of instructions to follow in order **Skills:** • To create a sequence of instructions to create a desired shape using an on-screen turtle	**Knowledge:** • To know that timings can be used between two characters to make sure everything happens in the right order **Skills:** • To test my algorithm my pressing the 'green flag' and say whether it did what I wanted it to or not • To be able to create an algorithm with multiple commands		**Knowledge:** • To know that 'debugging' is the process of identifying and removing errors **Skills:** • To be able to explain what a specific algorithm will do when ran • To be able to explain why an algorithm will or won't work	
Year 1/2 Cycle A Moon Zoom		Year 3/4 Cycle B Traiders and Raiders		Year 5/6 Cycle A Darwin's Delights	
• Explore a range of control toys and devices • Explore outcomes when individual buttons are pressed on a robot • Follow instructions to move around a course • Create a series instructions to move their peers around a course • Have experiences of controlling other devices such as sound recording devices, music players, video recording equipment and digital cameras	• Talk about how everyday devices can be controlled • Control a floor robot using appropriate buttons, Make predictions and estimate distances and turns • Create a sequence of instructions to control a programmable robot to carry out a pre-determined route to include direction, distance and turn	• Link their learning of a programmable robot to creating a set list of instructions for a on screen robot (e.g Textease turtle) • Use an on screen robot to draw a path	• Can talk about what everyday/real life objects uses algorithms and discuss what the algorithms will tell them to do • I know an algorithm is a set of instructions. • Draw using pen up and down linking their knowledge of properties of shapes	• Begin to think logically to analyse a simple game and discuss what the different algorithms should instruct. • Begin to create a simple game between two sprites	• Create a game that uses a range of commands including sensing, movement, variables and IF THEN. http://www.simonhaughton.co.uk/scratch-programming/
Knowledge: • To know that when toys move, make sounds, understand	**Knowledge:** • To know that every day items that involve technology and control	**Knowledge:** • To know that an algorithm is a set of instructions • To know that everyday/real life objects follow algorithms (moving/speaking toys)		**Knowledge:** • To know and be able to explain that the IF THEN function controls whether an action happens if the statement is true and doesn't happen if the statement is false	

that this links to computer programming. **Skills:** • To use toys and robots and explain what the buttons tell the computer to do. • To follow and create instructions to move around a course	such as a microwave, laptop etc. They will start to talk about why objects need to be controllable. **Skills:** • To make predictions of distances and turns when controlling an on screen robot	**Skills:** • To be able to create a simple algorithm for an on-screen turtle follow	**Skills:** • To create a game between two sprites that can be played by others

Computing Golden Nuggets
Multimedia

Year 1/2 Cycle A Rio De Vida		Year 3/4 Cycle B Burps, Bottoms and Bile		Year 5/6 Cycle B Alchemy Island	
• Develop familiarity with the keyboard – spacebar, backspace, shift, enter, to provide text on screen that is clear and error free • Select appropriate images • Add text to photographs, graphics (images) and sound e.g. captions, labelling and simple sentences through the use of e.g. *2create A Story* • To print • To save with help	• Use the mouse or arrow keys to insert words and sentences	• Combine a mixture of text and graphics to share my ideas in a presentation • Continue to make appropriate choices about fonts, images, size through peer assessment and self evaluation, evaluate design and make suitable improvements • Begin to use more than two fingers to enter text	• Use word art and animations when creating a presentation whilst considering the appropriate audience • Use a spell checker • Use more than two fingers when typing	• Design in response to a given criteria • Create simple hyperlinks and buttons in a presentation • Insert videos into a presentation • Begin to use two hands when typing • Evaluate websites and current publications in terms of colour, font, pictures and use this to inform their own work	• Create a presentation using timings, auto play and more complicated hyperlinks • Type confidently with two hands • Edit their presentation in response to peer feedback and considering the audience • Insert text boxes and use columns to create a more interesting layout
Knowledge: **Skills:** • To be able to use a keyboard efficiently: spacebar, backspace, shift, enter • To print • To save with help	**Knowledge:** **Skills:** • To use the mouse/arrow keys to insert words and sentences	**Knowledge:** **Skills:** • To be able to explain to a partner how their work can be improved to make the presentation more suitable for the audience: font, images and size • To be able to include text and graphics in a presentation		**Knowledge:** • To know that font colour and background colour should complement each other and not distract the reader **Skills:** • To create a hyperlink in a presentation • To evaluate and explain the positives and negatives of page layouts	

Year 1/2 Cycle B Paws, Claws and Whiskers		Year 3/4 Cycle A Playlist		Year 5/6	
• Use a paint package to create a picture to communicate their ideas: Explore shape, line and colour, talk about their choice of tools, talk about the differences between a graphics package and paper based art activities (undo, changes quickly and easily made)	• Develop basic editing skills including different presentational features (font size, colour and style) • Save, print, retrieve and amend their work • Use appropriate editing tools to improve their work		• Explore new media such as making videos • Record using a programme		
Knowledge: • To know there are different tools in a programme: shapes, lines, colours • To know the differences between a graphics programme and paper based art activities (undo, changes quickly, easily made) **Skills:** • To able to use different tools in a paint package	**Knowledge:** • To know that work can be edited by changed: font size, colour, style **Skills:** • To be able to save, print, retrieve and amend their work	**Knowledge:** • To know that you need to import the video to move between the different devices (camera and computer) • To know that videos can be edited to remove unwanted parts/make the video shorter **Skills:** • To be able to record a video using digital cameras		**Knowledge:** • **Skills:** •	

Year 1/2 Cycle B Towers, Tunnels and Turrets		Year 3/4 Cycle A Predator		Year 5/6 Cycle A Bloodheart	
• To make animated pictures/drawings in 2create a story (https://www.youtube.com/watch?v=u6NlVyMqJfC seesaw example)	• To create a stop frame animation using split pin figures	• To create a stop frame animation using one drawing	• To create a stop frame animation using two objects and one body	• To create a stop frame animation with two objects including movement and speech.	• To create a stop frame animation with two objects and a background/set.

		movement e.g. waving or walking		

Knowledge:
- To know that animation is making something that doesn't move by itself (drawing, model, inanimate object) look like it is moving
- To know that a cartoon is an example of stop frame animation and talk about this in relation programmes they have watched

Skills:
- To be able to use positional language in sequence to create instructions: left, right, up, down, diagonal, circular, etc.

Knowledge:
- To know a stop frame animations is a set of pictures played at speed to look like a video

Skills:
- To create a stop frame animation using a drawing or object

Knowledge:
-

Skills:
- To be able to create a stop frame animation using multiple objects and movements

Computing Golden Nuggets
Handling Data

Year 1/2 Cycle A Street Detectives		Year 3/4 Cycle B Blue Abyss		Year 5/6 Cycle A Frozen Kingdom	
To navigate around a pre-made branching database	Sort at least 3 pictures using a branching database	• Use a branch database to answer questions • Make a branch database with at least 4 pictures.	• create and use a branching database to organise, reorganise and analyse information	• Choose an appropriate programme to represent information	• To know when a database might be useful • Create a database that enables you to search through entries using fields
Knowledge: • To know a branching database sort groups of objects **Skills:** • To be able to use a branching database to answer questions	**Knowledge:** • **Skills:** • To be able to come up with questions to sort the pictures	**Knowledge:** • Digital software can be used to represent and sort data • A branching database is **a way of classifying a group of objects** • Open-ended questions are questions that allow someone to give a free-form answer. Closed-ended questions can be answered with "Yes" or "No," or they have a limited set of possible answers **Skills:** • To find an answer to a question using a branching database		**Knowledge:** • To know that a database organises information • To know that a database allows you to input a lot of information and find answers to questions timely and accurately **Skills:** • To be able to search a database to answer questions	

Year 1/2		Year 3/4 Cycle A Tribal Tales		Year 5/6 Cycle B Off with Her Head	
		• Use a datalogger remotely (without a computer) • To read the 3 different measurements of a data logger • To create environments/ situations where those readings change	• Use a data logger for snap shot readings • To retrieve saved information from a log box • To use log box information to draw graphs/tables	• To know what a data logger can be used for • To create an investigation to use the data logger to record information • To begin to link the data logger components to variables in science	• Use and interpret information from a data logger • To use computing programmes linked with the data logger • To choose how to record and represent information from a data logger using a computer
Knowledge: • **Skills:** •	**Knowledge:** • **Skills:** •	**Knowledge:** • To know a data logger can be used to record sound, light and temperature **Skills:** • To be able to use a data logger to record snap shots • To be able to retrieve information from a log box		**Knowledge:** • To know that a data logger can provide greater accuracy than reading a thermometer **Skills:** • To interpret line graphs formed by the data logger	

Year 1/2		Year 3/4		Year 5/6 Cycle A Hola Mexico	
				• Understand cells in a spreadsheet • to enter formulae for the four operations (+-x/) into a spreadsheet to use 'SUM' to calculate the total of a set of numbers in a range of cells	

Knowledge:	Knowledge:	Knowledge:	Knowledge:
•	•	•	• To know that the cells are the box in a spreadsheet
Skills:	Skills:		• To know that formulas 'answers' change automatically when you change the value inside of the cell
•	•	Skills:	Skills:
		•	• To recall and use the SUM formula

Computing Golden Nuggets
Technology in our Lives

Year 1/2 Cycle A Muck, Mess and Mixtures		Year 3/4		Year 5/6 Cycle B Time Traveller	
• Discuss where they have seen and used technology. • Sort pictures of what is and isn't classed as technology and discuss what each one is used for • Know how technology can be used to send messages (Class dojo, email etc.)	• Discuss why we use technology			• Know how chatrooms and social media and connect people from long distances • Take part in a forum including responding with text and media • Begin to discuss how the internet works including networks and IP addresses	• Know how being able to connect with people from long distances can enhance collaboration • Discuss the many uses for the internet • Know how information is transported on the internet including understanding networks and IP addresses
Knowledge: • To know that technology can be used to send messages **Skills:** • To say if something uses technology or not	**Knowledge:** • To know why we use technology (make things easier, quicker etc.) and to begin to know what we would have to do without technology – e.g. no washing machines, wash the clothes ourselves **Skills:** •	**Knowledge:** • **Skills:** •		**Knowledge:** • To know that computers use an IP address (Internet Protocol address) to identify each other. It's a bit like a postcode that is unique to each computer connected to the internet. • To know that a computer network is a number of computers linked together to allow them to "talk" to each other and share resources. Networked computers can share hardware, software and data. • To know that when information is being sent from one computer to another it is broken down into small bits of data called 'packets'. Each packet includes information about where the data is going to, where it is from and how to reassemble it. **Skills:** •	

Year 1/2 Cycle B Superheroes		Year 3/4 Cycle A I am Warrior		Year 5/6 Cycle A Revolution	
• Use given websites to answer questions	• Know the internet can be used for research • Know that pages have authors just like their own work	• Know how to create a simple search using a search engine • Label and talk about the use of different parts of a computer (laptops and desktops) e.g. mouse, keyboard, screen, power cable. Navigate across websites using the buttons.	• Create more specific searches using key words in a search engine. • Know how to choose an appropriate website (age, look, author) • Label and talk about the parts of a computer and products that enhance it's use (webcam, headphones, printers) and know their uses. • Navigate across websites using the back, forward, refresh and hyperlinks. • Begin to talk about the author of websites an how this effects it's truth. *(Also covered in E-Safety)*	• Create specific searches using "" and or in a search engine • Discuss how results are ranked • Know how to check for reliability of a website *(Also covered in E-Safety)* • Label parts of a webpage	• Compare two websites that given information on the same topic. Which is the most reliable? *(Also covered in E-Safety)* • Use other sources to check reliability of information. *(Also covered in E-Safety)* • Understand copyright and how this effects images and information I find on the internet *(Also covered in E-Safety)*
Knowledge: • **Skills:** •	**Knowledge:** • To know that the internet can be used to find tings out	**Knowledge:** • To know the different parts of a computer and explain what they do (mouse, keyboard, screen, power cable, webcam, headphones, printer)		**Knowledge:** • To know that when a search is made it pulls out which websites show those key words	

• To use a website to answer questions	• To know that the websites have authors just like books **Skills:** •	• To know that searches in a search engine need to be specific key words, not a full sentence **Skills:** •	• To know that the search engines are ranked: The more links that point to a webpage, the more useful it will seem. This means it will appear higher up in the results. **Skills:** •

Computing Golden Nuggets
E-Safety

	EYFS	Year 1/2 Cycle A Enchanted Woodland		Year 3/4 Cycle A Gods and Mortals		Year 5/6 Cycle A A Child's War	
	EYFS (4+)	Key Stage 1		Lower Key Stage 2		Upper Key Stage 2	
Self-Identity	I can recognise, online or offline, that anyone can say no/please stop/ I'll tell/ I'll ask to somebody who makes them feel sad, uncomfortable, embarrassed or upset	I can recognise that there may be people online who could make someone 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 and how they can help.	I can explain how other people may look and act differently online and offline I can give examples of issues online that might make someone feel sad, worried, uncomfortable or frightened; I can give examples of how they might get help.	I can explain what is meant by the term identity I can explain how people can represent themselves in different ways online I can explain ways in which someone might change their identify depending on what they are doing online (e.g. gaming; using an avatar; social media) and why	I can explain how my online identity can be different to by offline identity I can describe positive ways for someone to interact with others online and understand how this will positively impact on how others perceive them I can explain that others online can pretend to be someone else including by friends, and can suggest reasons why they might do this	I can explain how identity online can be copied, modified or altered. I can demonstrate how to make responsible choices about having an online identity, depending on context.	I can identify and critically evaluate online content relating to gender, race, religion, disability, culture and other groups, and explain why it is important to challenge and reject inappropriate representations online. I can describe issues online that could make anyone feel sad, worried, uncomfortable or frightened. I know and can give examples of how to get help, both on and offline. I can explain the importance of asking until I get the help needed.
Online Reputation	I can identify ways that I can put information on the internet	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 someone can last for a long time I can describe how anyone's online information could be seen by others I know who to talk to if something has been put online without consent or if it is incorrect.	I can explain how to search for information about others online I can give examples of what anyone may or may not be willing to share about themselves online. I can explain the need to be careful before sharing anything personal I can explain who someone can ask if they are unsure about putting something online	I can describe how to find out information about others by searching online I can explain ways that some of the information about anyone online could have been created copied or shared by others	I can search for information about an individual online and summarise the information found I can describe ways that information about anyone online can be used by others to make judgements about an individual, and why these may be incorrect.	I can explain the ways in which anyone can develop a positive online reputation I can explain strategies anyone can use to protect their 'digital personality' and online reputation, including degrees of anonymity.

Online Relationships	I can recognise some ways in which they internet can be used to communicate. I can give examples of how I (might) use technology to communicate with people I know.	I can give examples of when I should ask permission to do something online and explain why this is important. I can use the internet with adult support to communicate with people I know (e.g. video call apps or services). I can explain why it is important to be considerate and kind to people online and to respect their choices. I can explain why things one persons finds funny or sad online may not always be seen in the same way by others.	I can give examples of how someone might use technology to communicate with others they don't also know offline and explain why this might be risky. I can explain who I should ask before sharing things about myself or others online. I can describe different ways to ask for, give or deny my permission online and can identify who to ask for help if I am unsure. I can explain why I have a right to say 'no' or 'I will have to ask someone.' I can explain who can help me if I feel under pressure to agree to something I am unsure about or don't want to do. I can identify who can help me if something happens online without my consent. I can explain how it may make others feel if I do not ask their permission or ignore their answers before sharing something about them online. I can explain why I should always ask a trusted adult before clicking 'yes' 'agree' or 'accept' online	I can describe ways people have similar likes and interests can get together online. I can explain what it means to 'know someone' online and why this might be different from knowing someone offline. I can explain what is meant by 'trusting someone online,' and why it is important to be careful about who to trust online including what information and content they are trusted with. I can explain why someone may change their mind about trusting anyone with something if they feel nervous, uncomfortable or worried. I can explain how someone's feelings can be hurt by what is said or written online. I can explain the importance of giving and gaining permission before sharing things online; how the principles of sharing online is the same as sharing offline .g. sharing images and videos.	I can describe strategies for safe and fun experiences in a range of online social environments (e.g. live streaming, gaming platforms). I can give examples of how to be respectful to others online and describe how to recognise healthy and unhealthy online behaviours. I can explain how content shared online may feel unimportant to other people's thoughts, feelings and beliefs.	I can give examples of technology specific forms of communication (e.g. emojis, memes and GIFS). 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 describe some of the ways people may be involved in online communities and describe how they might collaborate constructively with others and make positive contributions (e.g. gaming communities or social media groups)	I can explain how sharing something online may have an impact either positively or negatively. I can describe how to be kind and show respect for others online including the importance of respecting boundaries regarding what is shared about them online and how to support them if others do not. I can describe how things shared privately online can have unintended consequences for others (e.g. screen grabs).
Online Bullying	I can describe the ways that some people can be unkind online. I can offer examples of how this can make others feel	I can describe how to behave online in ways that do not upset others and can give examples	I can explain what bullying is, how people may bully others and how bullying can make someone feel. I can explain why anyone who experiences bullying not to blame. I can talk about how anyone experiencing bullying can get help.	I can describe appropriate ways to behave towards other people online and why this is important. I can give examples of how bullying behaviour could appear online and how someone can get support.	I can recognise when someone is upset, hurt or angry online. I can describe ways people can be bullied through a range of media (e.g. image, video, text, chat). I can explain why people need to think carefully about how content they post might affect others, their feelings and how it may affect how others feel about them (their reputation).	I can recognise online bullying can be different to bullying in the physical world and can describe some of those differences. I can describe how what one person perceives as playful joking and teasing (including 'banter') might be experienced by others as bullying. I can explain how anyone can get help if they are being bullied online and identify when to tell a trusted adult. I can identify a range of ways to report concerns and access support both in school and at home about online bullying. I can explain how to block abusive users. I can describe the helpline services which can help people experiencing bullying, and how to access them (e.g. Childline or The Mix).	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 explain how someone would report online bullying in different contexts.

	EYFS	Year 1/2 Cycle B Bright Lights, Big City		Year 3/4 Cycle B Heroes and Villains		Year 5/6 Cycle B Peasants, Princes and Pestilence	
Managing Online Information	I can talk about how to use the internet as a way of finding information online. I can identify devices I could use to access information on the internet.	I can give simple examples of how to find information using digital technologies, e.g. search engines, voice activated searching). I know / understand that we can encounter a range of things online including things we like and don't like as well as things which are real or make believe / a joke. I know how to get help from a trusted adult if we see content that makes us feel sad, uncomfortable worried or frightened.	I can use simple 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, and know it is not a real person (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 real or true.	I can demonstrate how to use key phrases in search engines to gather accurate information online. 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. and can give examples of how and where they might be shared online, e.g. in videos, memes, posts, news stories etc. I can explain that not all opinions shared may be accepted as true or fair by others (e.g. monsters under the bed). I can describe and demonstrate how we can get help from a trusted adult if we see content that makes us feel sad, uncomfortable worried or frightened.	I can analyse information to make a judgement about probable accuracy and I understand why it is important to make my own decisions regarding content and that my decisions are respected by others. I can describe how to search for information within a wide group of technologies and make a judgement about the probable accuracy (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 why lots of people sharing the same opinions or beliefs online do not make those opinions or beliefs true. I can explain that technology can be designed to act like or impersonate living things (e.g. bots) and describe what the benefits and the risks might be. I can explain what is meant by fake news e.g. why some people will create stories or alter photographs and put them online to pretend something is true when it isn't.	I can explain the benefits and limitations of using different types of search technologies e.g. voice-activation search engine. I can explain how some technology can limit the information I am presented with e.g. voice-activated searching giving one result. 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 evaluate digital content and can explain how to make choices about what is trustworthy e.g. differentiating between adverts and search results. I can explain key concepts including: information, reviews, fact, opinion, belief, validity, reliability and evidence. I can identify ways the internet can draw us to information for different agendas, e.g. website notifications, pop-ups, targeted ads. I can describe ways of identifying when online content has been commercially sponsored or boosted, (e.g. by commercial companies or by vloggers, content creators, influencers). I can explain what is meant by the term 'stereotype', how 'stereotypes' are amplified and reinforced online, and why accepting 'stereotypes' may influence how people think about others. I can describe how fake news may affect someone's emotions and behaviour, and explain why this may be harmful. I can explain what is meant by a 'hoax'. I can explain why someone would need to think carefully before they share.	I can explain how search engines work and how results are selected and ranked. I can explain how to use search technologies effectively. 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'; why the popularity of an opinion or the personalities of those promoting it does not necessarily make it true, fair or perhaps even legal. I can define the terms 'influence', 'manipulation' and 'persuasion' and explain how someone might encounter these online (e.g. advertising and 'ad targeting' and targeting for fake news). I understand the concept of persuasive design and how it can be used to influences peoples' choices. I can demonstrate how to analyse and evaluate the validity of 'facts' and information and I can explain why using these strategies are important. I can explain how companies and news providers target people with online news stories they are more likely to engage with and how to recognise this. I can describe the difference between online misinformation and dis-information. 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 or disinformation). I can identify, flag and report inappropriate content
Health, well-being and lifestyle	I can identify rules that help keep us safe and healthy in and beyond the home when using technology. I can give some simple examples of these rules.	I can explain rules to keep myself safe when using technology both in and beyond the home.	I can explain simple guidance for using technology in different environments and settings e.g. accessing online technologies in public places and the home environment. I can say how those rules / guides can help anyone accessing online technologies. I can explain why some online activities have age restrictions, why it is important to follow them and know who I can talk to if others pressure me to watch or do something online that makes me feel uncomfortable (e.g. age restricted gaming or web sites).	I can explain why spending too much time using technology can sometimes have a negative impact on anyone, e.g. mood, sleep, body, relationships; I can give some examples of both positive and negative activities where it is easy to spend a lot of time engaged (e.g. doing homework, games, films, videos).	I can explain how using technology can be a distraction from other things, in both a positive and negative way. I can identify times or situations when someone may need to limit the amount of time they use technology e.g. I can suggest strategies to help with limiting this time.	I can describe ways technology can affect health and well-being both positively (e.g. mindfulness apps) and negatively. I can describe some strategies, tips or advice to promote health and wellbeing with regards to technology. I recognise the benefits and risks of accessing information about health and well-being online and how we should balance this with talking to trusted adults and professionals. I can explain how and why some apps and games may request or take payment for additional content (e.g. in-app purchases, lootboxes) and explain the importance of seeking permission from a trusted adult before purchasing.	I can describe common systems that regulate age-related content (e.g. PEGI, BBFC, parental warnings) and describe their purpose. I recognise and can discuss the pressures that technology can place on someone and how / when they could manage this. I can recognise features of persuasive design and how they are used to keep users engaged (current and future use). I can assess and action different strategies to limit the impact of technology on health (e.g. night-shift mode, regular breaks, correct posture, sleep, diet and exercise).

Privacy and Security	I can identify some simple examples of my personal information (e.g. name, address, birthday, age, location). I can describe who would be trustworthy to share this information with; I can explain why they are trusted.	I can explain that passwords are used to protect information, accounts and devices. I can recognise more detailed examples of information that is personal to someone (e.g where someone lives and goes to school, family names). I can explain why it is important to always ask a trusted adult before sharing any personal information online, belonging to myself or others.	I can explain how passwords can be used to protect information, accounts and devices. I can explain and give examples of what is meant by 'private' and 'keeping things private'. I can describe and explain some rules for keeping personal information private (e.g. creating and protecting passwords). I can explain how some people may have devices in their homes connected to the internet and give examples (e.g. lights, fridges, toys, televisions).	I can describe simple strategies for creating and keeping passwords private. I can give reasons why someone should only share information with people they choose to and can trust. I can explain that if they are not sure or feel pressured then they should tell a trusted adult. I can describe how connected devices can collect and share anyone's information with others.	I can describe strategies for keeping personal information private, depending on context. I can explain that internet use is never fully private and is monitored, e.g. adult supervision. I can describe how some online services may seek consent to store information about me; I know how to respond appropriately and who I can ask if I am not sure. I know what the digital age of consent is and the impact this has on online services asking for consent.	I can explain what a strong password is and demonstrate how to create one. I can explain how many free apps or services may read and share private information (e.g. friends, contacts, likes, images, videos, voice, messages, geolocation) with others. I can explain what app permissions are and can give some examples.	I can describe effective ways people can manage passwords (e.g. storing them securely or saving them in the browser). I can explain what to do if a password is shared, lost or stolen. I can describe how and why people should keep their software and apps up to date, e.g. auto updates. 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). I know that online services have terms and conditions that govern their use.
Copyright and Ownership	I know that work I create belongs to me. I can name my work so that others know it belongs to me.	I can explain why work I create using technology belongs to me. I can say why it belongs to me (e.g. 'I designed it' or 'I filmed it'). I can save my work under a suitable title / name so that others know it belongs to me (e.g. filename, name on content). I understand that work created by others does not belong to me even if I save a copy	I can recognise that content on the internet may belong to other people. I can describe why other people's work belongs to them.	I can explain why copying someone else's work from the internet without permission isn't fair and can explain what problems this might cause.	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 of content which I must not use without permission from the owner, e.g. videos, music, images.	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 and know how this content can be found online.	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.