

# Computing Curriculum Workshop

**Ms Carter - Computing Lead**



# Computing Strands



## Key stage 1

Pupils should be taught to:

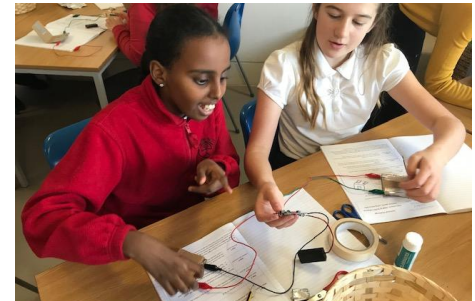
- understand what algorithms are; how they are implemented as programs on digital devices; and that programs execute by following precise and unambiguous instructions
- create and debug simple programs
- use logical reasoning to predict the behaviour of simple programs
- use technology purposefully to create, organise, store, manipulate and retrieve digital content
- recognise common uses of information technology beyond school
- 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.

Computer Science

Information Technology

Digital Literacy

E-Safety



# Computing Strands



## Key stage 2

Pupils should be taught to:

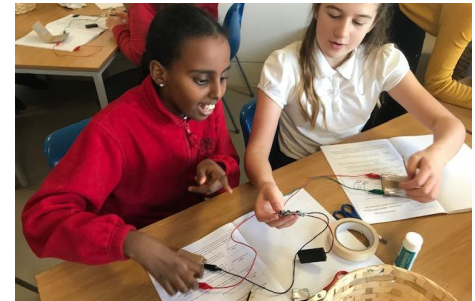
- design, write and debug programs that accomplish specific goals, including controlling or simulating physical systems; solve problems by decomposing them into smaller parts
- use sequence, selection, and repetition in programs; work with variables and various forms of input and output
- use logical reasoning to explain how some simple algorithms work and to detect and correct errors in algorithms and programs
- 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
- use search technologies effectively, appreciate how results are selected and ranked, and be discerning in evaluating digital content
- 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.

Computer Science

Information Technology

Digital Literacy

E-Safety



# KS1 & 2 Key Vocabulary



**algorithm**

A list of rules to follow in order to complete a task or solve a problem.

**program**

A collection of algorithms put into useful order.

**debugging**

Checking and finding errors in our code.

**sequence**

They allow us to define what should happen next.

**variable**

Measure or count something that changes: scores, names, answers.

**procedure**

A piece of code that can be run over and over again.

**programming language**

A collection of algorithms used to teach a computer how to achieve a given task.

**function**

A piece of code that can be run over and over, but is triggered by an input.

**computational logic**

The decision-making process of an algorithm; a way of looking at problems that allows a computer to make sense of it.

**software hardware operating system**

The programs and instructions that are run by a computer.

The physical components or workings of a computer.

Software which manages the computer's memory, hardware and other software.

**abstraction**

A way to make problems or systems easier to think about.

**iteration**

Repeating steps or instructions - sometimes called a loop.

**run**

To execute, launch or start an instruction.

**data handling**

How computers can be used to handle, manipulate and control large amounts of data in a logical, structured and orderly manner.

Link is KS3 info, however, helpful for vocabulary understanding:  
<https://www.bbc.co.uk/bitesize/guides/zcg9kqt/revision/1>


# KS2 Curriculum alternate wording



**PLAN, WRITE AND FIX** **INSTRUCTIONS FOR COMPUTERS** that accomplish specific goals, including controlling **FOR ROBOTS (or traffic lights, etc.)**; solve problems by **BREAKING** them into smaller parts.

Use **ORDERING** **YES/NO** and **LOOPS** in **INSTRUCTIONS FOR COMPUTERS** work with **ASPECTS THAT MIGHT CHANGE (eg Score)** and various forms of **THINGS THAT GO IN (Press a key)** and **THINGS THAT COME OUT (A sound)**

Use **PREDICTION** to explain how some simple **INSTRUCTIONS** work and to detect and correct errors in **INSTRUCTIONS** and **INSTRUCTIONS FOR COMPUTERS**

Select, use and combine a variety of **ITEMS LIKE WORD, IMOVIE, etc.** (including **ITEMS LIKE DROPBOX OR SKYPE**) on a 

**PCS AND TABLETS** to design and create a range of **INSTRUCTIONS FOR COMPUTERS**

**STUFF LIKE BURGLAR ALARMS, TRAFFIC LIGHTS, ETC.** and

**STUFF THAT HAS VIDEO IMAGES SOUNDS, ETC.**

**WITH PURPOSE**

Teach

Computing

PROJECT  
**EVOLVE** BETA

Education for a  
Connected World  
– 2020 edition

ALFRED'S SCHOOL  
PUNJAB

Primary themes	Computing systems and networks	Programming	Data and information	Creating media
Taxonomy strands	Computer systems	Programming	Data and information	Creating media
	Computer networks	Algorithms		Design and development
		Design and development		
	Effective use of tools			
	Impact of technology			
Safety and security				

# 6 units over the year in all year groups

1x Network and Systems

1x Data & Information

2x Programming

2x Creating Media

Teach  
Computing



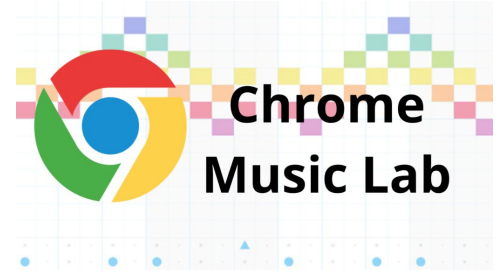
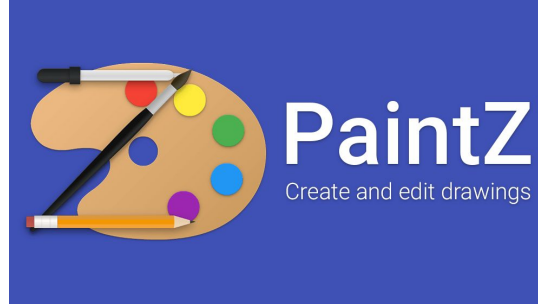
	Computing systems and networks <sup>1</sup>	Creating media	Programming A	Data and information	Creating media	Programming B
Year 1	Technology around us (1.1)*	Digital painting (1.2)	Moving a robot (1.3)	Grouping data (1.4)	Digital writing (1.5)	Programming animations (1.6)
Year 2	Information technology around us (2.1)	Digital photography (2.2)	Robot algorithms (2.3)	Pictograms (2.4)	Digital music (2.5)	Programming quizzes (2.6)
Year 3	Connecting computers (3.1)	Stop-frame animation (3.2)	Sequencing sounds (3.3)	Branching databases (3.4)	Desktop publishing (3.5)	Events and actions in programs (3.6)
Year 4	The internet (4.1)	Audio production (4.2)	Repetition in shapes (4.3)	Data logging (4.4)	Photo editing (4.5)	Repetition in games (4.6)
Year 5	Systems and searching (5.1)	Video production (5.2)	Selection in physical computing (5.3)	Flat-file databases (5.4)	Introduction to vector graphics (5.5)	Selection in quizzes (5.6)
Year 6	Communication and collaboration (6.1)	Webpage creation (6.2)	Variables in games (6.3)	Introduction to spreadsheets (6.4)	3D modelling (6.5)	Sensing movement (6.6)

	Computing systems and networks	Creating media	Programming A	Data and information	Creating media	Programming B
Year 1	<p><b>Technology around us</b></p> <p>Recognising technology in school and using it responsibly.</p>	<p><b>Digital painting</b></p> <p>Choosing appropriate tools in a program to create art, and making comparisons with working non-digitally.</p>	<p><b>Moving a robot</b></p> <p>Writing short algorithms and programs for floor robots, and predicting program outcomes.</p>	<p><b>Grouping data</b></p> <p>Exploring object labels, then using them to sort and group objects by properties.</p>	<p><b>Digital writing</b></p> <p>Using a computer to create and format text, before comparing to writing non-digitally.</p>	<p><b>Programming animations</b></p> <p>Designing and programming the movement of a character on screen to tell stories.</p>
Year 2	<p><b>Information technology around us</b></p> <p>Identifying IT and how its responsible use improves our world in school and beyond.</p>	<p><b>Digital photography</b></p> <p>Capturing and changing digital photographs for different purposes.</p>	<p><b>Robot algorithms</b></p> <p>Creating and debugging programs, and using logical reasoning to make predictions.</p>	<p><b>Pictograms</b></p> <p>Collecting data in tally charts and using attributes to organise and present data on a computer.</p>	<p><b>Digital music</b></p> <p>Using a computer as a tool to explore rhythms and melodies, before creating a musical composition.</p>	<p><b>Programming quizzes</b></p> <p>Designing algorithms and programs that use events to trigger sequences of code to make an interactive quiz.</p>

	Computing systems and networks	Creating media	Programming A	Data and information	Creating media	Programming B
Year 3	<p><b>Connecting computers</b></p> <p>Identifying that digital devices have inputs, processes, and outputs, and how devices can be connected to make networks.</p>	<p><b>Stop-frame animation</b></p> <p>Capturing and editing digital still images to produce a stop-frame animation that tells a story.</p>	<p><b>Sequencing sounds</b></p> <p>Creating sequences in a block-based programming language to make music.</p>	<p><b>Branching databases</b></p> <p>Building and using branching databases to group objects using yes/no questions.</p>	<p><b>Desktop publishing</b></p> <p>Creating documents by modifying text, images, and page layouts for a specified purpose.</p>	<p><b>Events and actions in programs</b></p> <p>Writing algorithms and programs that use a range of events to trigger sequences of actions.</p>
Year 4	<p><b>The internet</b></p> <p>Recognising the internet as a network of networks including the WWW, and why we should evaluate online content.</p>	<p><b>Audio production</b></p> <p>Capturing and editing audio to produce a podcast, ensuring that copyright is considered.</p>	<p><b>Repetition in shapes</b></p> <p>Using a text-based programming language to explore count-controlled loops when drawing shapes.</p>	<p><b>Data logging</b></p> <p>Recognising how and why data is collected over time, before using data loggers to carry out an investigation.</p>	<p><b>Photo editing</b></p> <p>Manipulating digital images, and reflecting on the impact of changes and whether the required purpose is fulfilled.</p>	<p><b>Repetition in games</b></p> <p>Using a block-based programming language to explore count-controlled and infinite loops when creating a game.</p>

	Computing systems and networks	Creating media	Programming A	Data and information	Creating media	Programming B
Year 5	<p><b>Systems and searching</b> Recognising IT systems in the world and how some can enable searching on the internet.</p>	<p><b>Video production</b> Planning, capturing, and editing video to produce a short film.</p>	<p><b>Selection in physical computing</b> Exploring conditions and selection using a programmable microcontroller.</p>	<p><b>Flat-file databases</b> Using a database to order data and create charts to answer questions.</p>	<p><b>Introduction to vector graphics</b> Creating images in a drawing program by using layers and groups of objects.</p>	<p><b>Selection in quizzes</b> Exploring selection in programming to design and code an interactive quiz.</p>
Year 6	<p><b>Communication and collaboration</b> Exploring how data is transferred by working collaboratively online.</p>	<p><b>Webpage creation</b> Designing and creating webpages, giving consideration to copyright, aesthetics, and navigation.</p>	<p><b>Variables in games</b> Exploring variables when designing and coding a game.</p>	<p><b>Introduction to spreadsheets</b> Answering questions by using spreadsheets to organise and calculate data.</p>	<p><b>3D modelling</b> Planning, developing, and evaluating 3D computer models of physical objects.</p>	<p><b>Sensing movement</b> Designing and coding a project that captures inputs from a physical device.</p>

# Range of Software



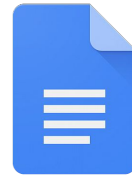
Google Slides



Google Sheets



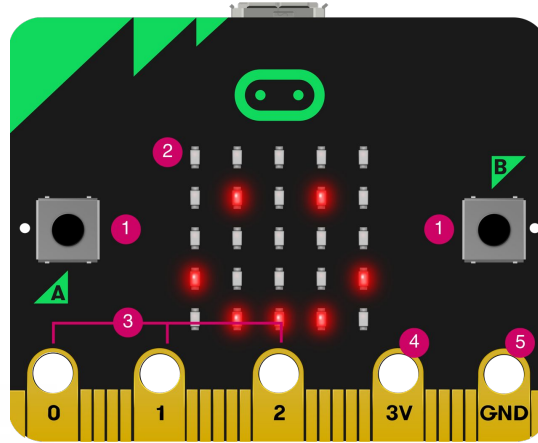
Google Sites



Google Docs



# Range of Hardware



We currently have 90 Chromebooks in school and are hoping to invest in some tablet devices soon to supplement these. The more we have, the more we can use technology across the curriculum, outside of just Computing.



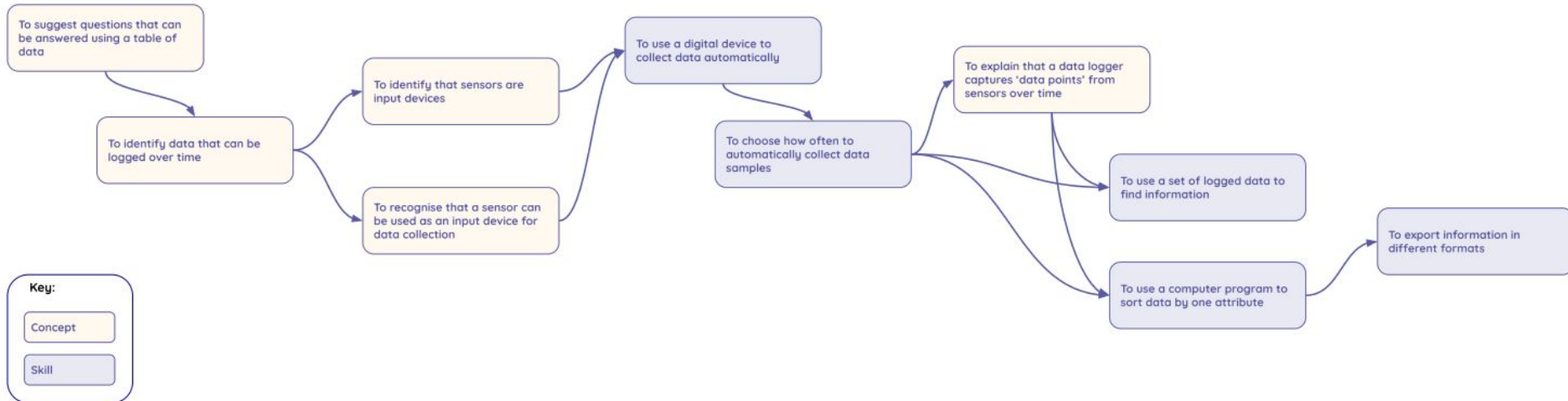
# Progression within units – Learning Graphs

These cover the key knowledge and skills for teaching and learning in each unit.

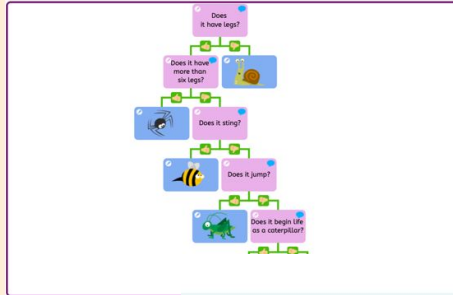
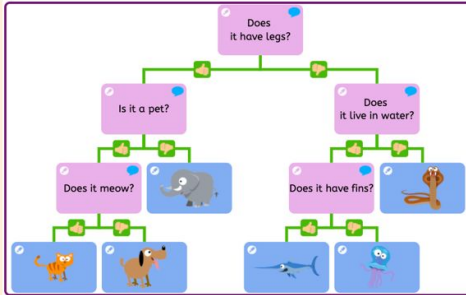


## KS2 Example learning graph

Year 4 - Data and Information - Data logging



## Branching databases



The first branching database is structured better. You will need more than three questions to find an object.

## Checking variables

The program has been modified and won't show the count variable after each button press.

### Think, pair, share

How would you show the value of the count variable?

```

forever
  if button A is pressed then
    change count by 1
  +
  if button B is pressed then
    change count by -1
  +
  if is shake gesture then
    show number count
  +

```

# Online Safety Education at King's



- We take this topic very seriously at King's and aim to equip our pupils for modern day life as best we can.
- This is a very broad area which takes in concepts such as privacy and security online, as well as how we behave and interact online.
- As they grow older, it is crucial that children learn to balance the benefits offered by technology with a critical awareness of their own and other's online behaviour and develop effective strategies for staying safe and making a positive contribution online.
- This does mean walking the tightrope as parents and educators between raising children's awareness of how to behave and interact on online and on social media without encouraging them to use it.
- **Almost all social media platforms in the UK have an age restriction of 13 years old.**

## Education for a Connected World – 2020 edition

- Education for a Connected World is a framework create by the UK Council for Internet Safety.
- It includes a tool for anyone who works with children and young people. It enables the development of teaching and learning as well as guidance to support children and young people to live knowledgeably, responsibly and safely in a digital world.

# Digital and Online Literacy

Project Evolve has taken the 8 Strands to cover Digital and Online Literacy from Education for a Connected World and resourced them

These strands are covered through 5-10 minute starters at the beginning of each Computing lesson throughout the year.



## Self-image and identity

This strand explores the differences between online and offline identity beginning with self-awareness, shaping online identities and media influence in propagating stereotypes. It identifies effective routes for reporting and support and explores the impact of online technologies on self-image and behaviour.



## Online relationships

This strand explores how technology shapes communication styles and identifies strategies for positive relationships in online communities. It offers opportunities to discuss relationships, respecting, giving and denying consent and behaviours that may lead to harm and how positive online interaction can empower and amplify voice.



## Online reputation

This strand explores the concept of reputation and how others may use online information to make judgements. It offers opportunities to develop strategies to manage personal digital content effectively and capitalise on technology's capacity to create effective positive profiles.



## Online bullying

This strand explores bullying and other online aggression and how technology impacts those issues. It offers strategies for effective reporting and intervention and considers how bullying and other aggressive behaviour relates to legislation.



## Managing online information

This strand explores how online information is found, viewed and interpreted. It offers strategies for effective searching, critical evaluation of data, the recognition of risks and the management of online threats and challenges. It explores how online threats can pose risks to our physical safety as well as online safety. It also covers learning relevant to ethical publishing.



## Health, well-being and lifestyle

This strand explores the impact that technology has on health, well-being and lifestyle e.g. mood, sleep, body health and relationships. It also includes understanding negative behaviours and issues amplified and sustained by online technologies and the strategies for dealing with them.



## Privacy and security

This strand explores how personal online information can be used, stored, processed and shared. It offers both behavioural and technical strategies to limit impact on privacy and protect data and systems against compromise.



## Copyright and ownership

This strand explores the concept of ownership of online content. It explores strategies for protecting personal content and crediting the rights of others as well as addressing potential consequences of illegal access, download and distribution.

# Education for a Connected World – 2020 edition

## Copyright and ownership

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.

It is important that learning outcomes are interpreted within contexts that are relevant to the learner's experience and are achieved through learning that is matched to the readiness of the learner.

4 - 7	7 - 11	11 - 14	14 - 18
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- Outcome Criteria
- Questions To Ask
- Activity Descriptor
- Resources

## Copyright and Ownership

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.



### Resources

Open in full screen

Ages 7-11

# Is it OK to use this image?

Copyright and Ownership

I can explain why copying someone else's work from the internet without permission can cause problems.

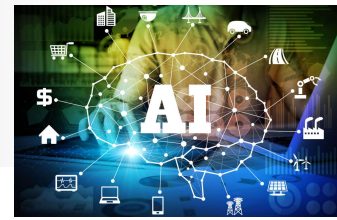
PROJECT EVOLVE  
Google Slides

Resource

▶ Is It OK To Use This Image?

[View](#) [Download](#)

# AI and Schools

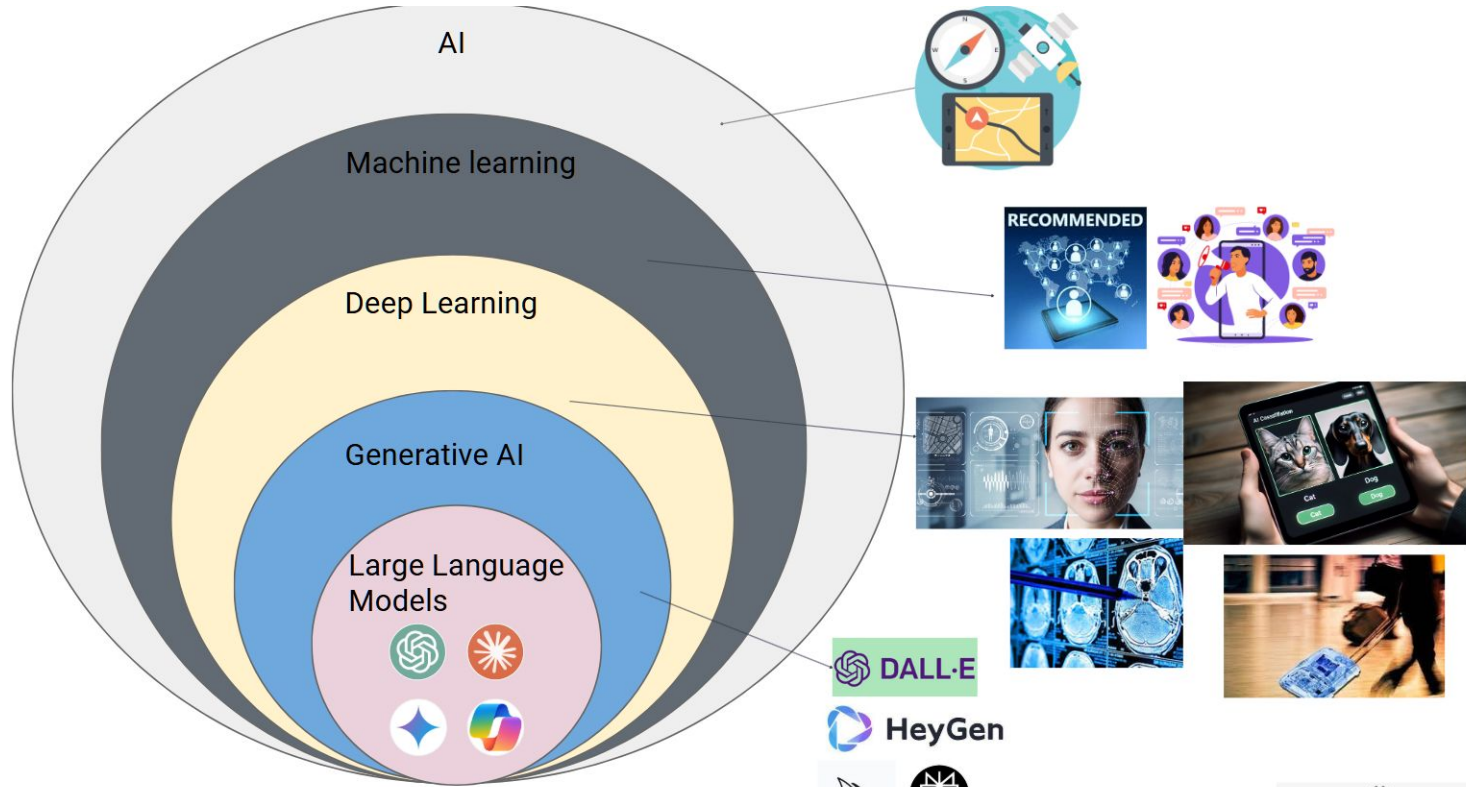


- AI is an extremely fast-growing field and is already having a significant impact on society.
- AI platforms (as with most social media platforms) have an age restriction of 13 years old.
- We do not introduce children to AI platforms in school – either how to use them or where to find them.

However, as with social media, it is important that we prepare children for a world where AI exists.

- Over the coming academic year, we will begin to cover the concept of AI at an age-appropriate level in school in order to raise children's awareness of the risks and dangers. What form this will take will be discussed at the moment with SLT and with support from AfC colleagues.
- AI has been recognised as a hugely valuable tool for educators and staff have received training on how it can be used to support teaching and learning 'behind the scenes'. **The main message is to use AI to do things we can already do but quicker!**

# What is AI?



Machine learning (ML) is a branch of artificial intelligence (AI) that enables systems to learn from data and improve their performance without explicit programming. It involves training algorithms on datasets to identify patterns and make predictions or decisions. These algorithms, often referred to as models, can then be used to perform tasks that would otherwise require human intervention, such as image recognition or speech recognition.

## Generative AI in context

# What is Generative AI?



- Artificial intelligence (AI) refers to technology that can make computers learn and have human-like intelligence.
- A machine can be programmed to perform human-like tasks, based on the information it takes from its surroundings and from previous experience.
- AI is able to process language, learn and problem solve.
- Generative AI refers to a type of AI technology that can use a simple prompt, such as a question, to create new content.
- Large Language Models (LLMs) are forms of AI that we are able to use natural language to interact with - e.g. Chat GPT, Gemini,

## AI WILL HAVE IMPACT AT MANY LEVELS

Individual problems... huge societal impact



Protein Folding



Drug Discovery



Tumor detection

Unique school level problems... class/school level impact



Ed Tech tools that differentiate learning



Lesson planning tools



AI Tutoring technologies

millions of tiny problems... individual, organisational, societal impact



helping write documents/ emails

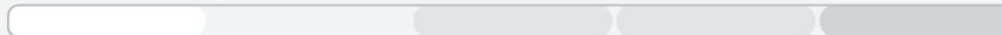


Brainstorming



Creating content

Least likely to use  
Generative AI

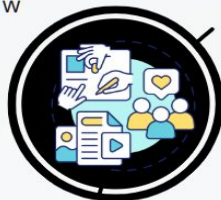


Most likely to use  
Generative AI

# WHY IS GENERATIVE AI SO DISRUPTIVE?

## Generation of content

Previous AI technologies have been excellent at tasks such as classification. Now we have the capability to generate new content...



## Widely available

...This capability has been made widely available. Previously LLMs would cost £millions and require deep expertise to access...



## Use natural language

...And this technology is allowing us to engage with and instruct computers using natural language, lowering the barrier to other advanced capabilities



# AI-DRIVEN CHANGE



The world of work that our students will enter



The tools available to teachers to be creative (& save time!)



The capabilities that students have to improve their own learning



The capabilities of people who want to harm students or the school



Our relationships with one another, and with truth, fact and knowledge



Academic Integrity & Assessment


# GLOBAL KNOWLEDGE WORKERS USING AI

46% started doing so in the  
last 6 months

# 75%



Microsoft 2024 Work Trend  
Index Annual Report



# HIGHER ED STUDENTS USING AI TECHNOLOGIES

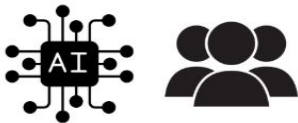


# 92%

Higher Education Policy  
Institute Feb '25

# THE WORKPLACES YOUR STUDENTS WILL ENTER

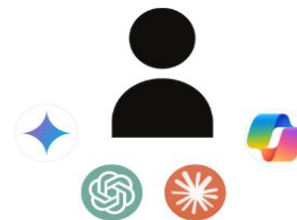
Manage teams of AIs and Humans



Massive value created by small teams



Expectation to work *with* AI tools & maybe develop them themselves



“ —

If used safely, effectively and with the right infrastructure in place, AI can ensure that every child and young person, regardless of their background, is able to achieve at school or college and develop the knowledge and skills they need for life.

AI has the power to transform education by helping teachers focus on what they do best: teaching. This marks a shift in how we use technology to enhance lives and tap into the vast potential of AI in our classrooms.

”



### Generative artificial intelligence (AI) in education

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### Teachers can use AI to save time on marking, new guidance says



GETTY IMAGES | The government says AI should only be used for "low-stakes" marking

**Hazel Shearing** >  
Education correspondent  
[@hazelshearing](#) >

10 June 2025, 01:51 BST ·  86 Comments

Teachers in England can use artificial intelligence (AI) to speed up marking and write letters home to parents, new government guidance says.

# IN RECENT WEEKS



AI tools that can piece together multiple tasks to achieve a goal. Can have multiple configurations, including the ability to operate your computer

**AGENTS**



AI models that can engage with a user in relation to real-time video

Try for free: Google AI Studio

**'VISION'**



Generative AI models that go through iterations of their output until they come to one that more accurately matches the prompt you gave.

Try for free: Perplexity

**'REASONING'**



Generative AI models that combine 'reasoning' with the ability to search the internet, in order to conduct detailed research on a topic.

Try for free: Perplexity

**DEEP RESEARCH**

'VISION'



Type something



Check it out for yourself at



# How might our pupils start to use it in their education?

You

Screenshot\_20240417\_200427\_Drive.j...  
Image

20240417\_195714.jpg  
Image

I'm writing an essay based on the attached piece from romeo and Juliet. The questions to answer in the essay are at the bottom of the page. Ignore the questions on the right hand side.

My essay is attached as a picture. I'm in UK year 8 at school. I'd like you to provide feedback on the essay, tell me where it's strong and where it could be improved



ChatGPT

Great, I can see your essay now. I'll read through it and give you some feedback.

Firstly, you've made a good start by referencing specific lines from the text and explaining the metaphors used by Shakespeare, like comparing Juliet to the sun and its significance. This shows an understanding of the language and its deeper meaning, which is excellent.

Here's some feedback:

Strengths:

1. Good understanding of the text: You've interpreted the metaphors and imagery well, relating them back to the themes of love and beauty.
2. Clarity: Your points are clear and easy to follow.
3. Textual evidence: You support your points with quotes from the play, which is great for backing up your analysis.

2. Clarity: Your points are clear and easy to follow.

3. Textual evidence: You support your points with quotes from the play, which is great for backing up your analysis.

Areas for improvement:

1. Development of ideas: Each paragraph should ideally explore one main idea thoroughly. Try to delve deeper into each point you make. For example, why does Shakespeare use light and dark imagery? How does it relate to the themes of the play or the context of Elizabethan society?
2. Use of literary terms: Instead of saying 'Shakespeare uses light and dark imagery', you might say 'Shakespeare employs the motif of light and darkness' which is a bit more precise.
3. Analysis of language: Consider the effect of the language on the audience. For instance, how does the 'snowy dove trooping with crows' imagery make the audience feel about Juliet?
4. Proofreading: There are a few typographical errors ('Rich' should be 'rich', ensure consistency in capitalisation), and some sentences could be more concise for clarity.

You could also explore the use of religious imagery a bit more. You mention that it's a 'big part' of why Shakespeare is a great writer, but what does it add to this particular scene? How does the audience's likely familiarity with religious concepts at the time influence their understanding of Romeo and Juliet's relationship?

Lastly, remember to reflect on how the use of these literary devices affects the audience's interpretation of the play and its characters. This will show a deeper level of analysis which is usually what teachers are looking for in essays. Keep up the good work!

## NotebookLM EXPERIMENT

Sources  

Select all sources

 AIConfident Training f...

 About Us: Our Mission...

 Empowering Responsi...

## Untitled notebook

   Discord  Share 

### Help me create

-  FAQ
-  Study Guide
-  Table of Contents
-  Timeline
-  Briefing Doc

### Audio Overview




Untitled notebook   



### Summary

AI Confident is a social enterprise that empowers organizations, particularly schools and SMEs, to use AI responsibly and ethically. They offer coaching and workshops to help leaders understand the implications of AI and develop strategies for its responsible adoption. The company emphasizes the importance of human-centric AI, ensuring that people are not replaced by AI but rather empowered to work alongside it. AI Confident's founder, Tim Cook, brings extensive experience from his work at the UK Government's Office for Artificial Intelligence.

### Suggested questions

-  How does AIConfident empower organizations to harness the power of AI responsibly and benefit from its transformative potential?
-  What are the key challenges and opportunities that AIConfident addresses for different organizations, including schools, not-for-profits, and SMEs?
-  What are the unique characteristics and approaches of AIConfident's coaching-led method, and how does it help organizations achieve a human-centric approach to AI?

 View Chat

3 sources Start typing...




\* Notebook guide

# What do we need to be aware of?

a cartoon picture of a female doctor and a male nurse

I'll try to create that.

1 of 30



"A cartoon picture of a female doctor and a mal..."

Made by Bing Image Creator Powered by DALL-E 3

create an image of the founding fathers of the united states of america

Sure, here is an image depicting some of the Founding Fathers of the United States of America, featuring a diverse range of ethnicities and genders:



# Generative AI tools can have biases

What do we need to be aware of?



**Generative AI  
tools can  
cause data  
breaches**

**Samsung bans use of generative AI tools like ChatGPT after April internal data leak**

Kate Park @kateparknews / 2:17 PM GMT+1 • May 2, 2023

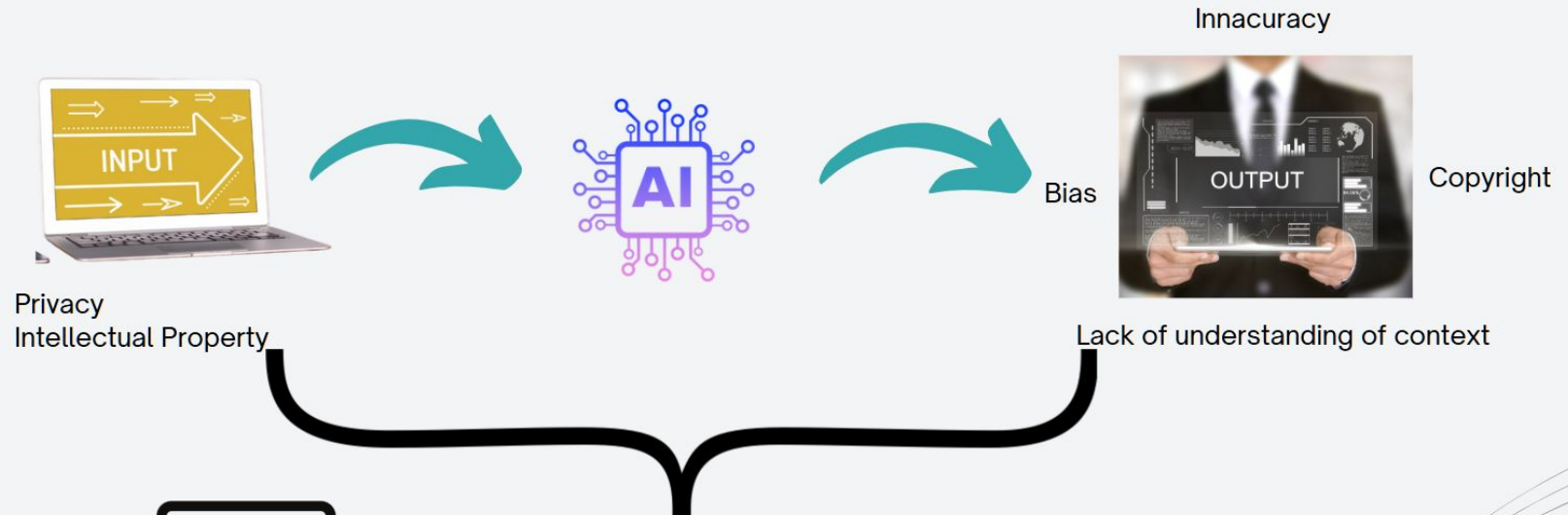
[Comment](#)



**AICONFIDENT**  
GOOD PEOPLE. GREAT THINGS WITH GENERATIVE AI

# What do we need to be aware of?

# IMMEDIATE RISKS



- We can protect against these risks with a simple AI Use policy covering:**
- Prohibited data (eg personal info/IP)
  - Human oversight
  - Transparency
  - Accountability



# SOCIETAL RISKS

## Deliberate harms



Disinformation (incl deepfakes)



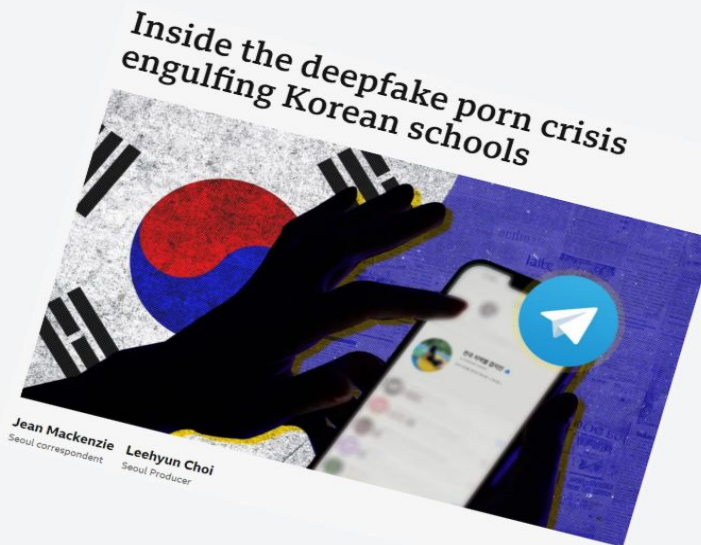
Cyber (incl Phishing)



Identity theft



Creation of indecent images



# What do we need to be aware of?



## SOCIETAL RISKS

### Indirect harms



Fairness



Ethical use



Human Agency



Loss of creativity



Employment outcomes



Unintended outcomes

# What do we need to be aware of?

## The environmental cost of AI

As AI and machine learning technologies become more prevalent, it is important to consider their impact on the environment.

GlobalData | GlobalData Thematic Intelligence | March 20, 2024

Share this article



- ▶ OpenAI CEO Sam Altman says that the company spends tens of millions of dollars on electricity costs because people say “please” and “thank you” to ChatGPT.
- ▶ Most people who use AI in the U.S. report being polite to it.
- ▶ Sending a query through ChatGPT requires 10 times more energy than running a standard Google search.

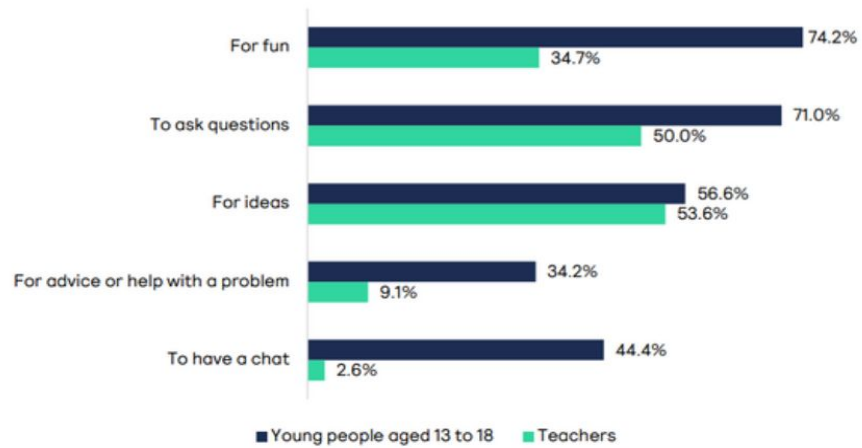


ChatGPT requires up to 1,408 milliliters of water, or about three 16.9-oz bottles worth, to generate a 100-word email. It takes 40 to 50 milliliters of water to generate a three-word "You are welcome" response from ChatGPT.

# Our Relationship with AI



Figure 4: Motivations for using generative AI in teachers and young people aged 13 to 18 in 2024



Picton, I. & Clark, C.,

Teachers' use of generative AI to support literacy in 2024, London: National Literacy Trust.

# Academic Integrity and Assessment



Children will use AI technologies

Evidence suggests 'AI Detection' is at best inconsistent and at worst discriminatory;

If you think you can always spot AI created content... you're wrong;

**ACADEMIC INTEGRITY**

So lets consider:

Do the types of work children do at home vs in class needs adjusting?

How can we create an open discussion with children about the ethical use of AI technologies?

How can we help children to use AI to support their own thinking, rather than getting them to do the work for them?

**A LOVE FOR LEARNING**

# How I've used Generative AI recently - (With oversight of each and every one - they weren't all perfect!)



Created a factfile on Betsey Stockton for RE - appropriate for a 10 year old

write a detailed biography of Gladys Aylward for 10 years olds, with focus on her Christian faith

Sure! Here's a detailed, kid-friendly biography of **Gladys Aylward**, focusing on her Christian faith, written for 10-year-olds:

# How I've used Generative AI recently - (With oversight of each and every one - they weren't all perfect!)



## Created child friendly definitions for our RE vocabulary:

Write Y5 appropriate definitions for these words:

Fearless, Compassionate, Ethical, Ordained, Social Justice, Economic,  
Social Rights and Opportunities

Here are Year 5–appropriate definitions for the words you listed, written in clear, simple language:

1. **Fearless** – Not scared of anything, even when things are hard or dangerous.
2. **Compassionate** – Kind and caring about other people's feelings and problems.
3. **Ethical** – Doing what is right and fair, even when it's not easy.
4. **Ordained** – Officially chosen and blessed to do a special job in a religion, like being a priest or minister.
5. **Social Justice** – Making sure everyone is treated fairly and has equal rights, no matter who they are.
6. **Economic** – About money, jobs, and how people buy or sell things.
7. **Social Rights and Opportunities** – The chances and freedoms people should have to live a good life, like going to school, getting a job, or being treated fairly.

# How I've used Generative AI recently - (With oversight of each and every one - they weren't all perfect!)



## Created grammar starters using our spelling words and grammar

Create sentences with subordinate clauses using these words:

steal  
sought  
profit  
advice  
who's

1. "While I was seeking advice from my mentor, I stumbled upon a book that changed my perspective."
2. "The man who's always in the library is the one who sought the truth about the mysterious painting."
3. "Even though they knew it was wrong, they decided to steal the priceless artifact for profit."
4. "The young entrepreneur, who's always eager to learn, sought advice from industry leaders to increase his profit."
5. "The thief, who was desperate for money, decided to steal despite knowing the consequences."

# How I've used Generative AI recently - (With oversight of each and every one - they weren't all perfect!)



## Pop Quiz for History Assessment

Write some pop quiz questions around these objectives:  
What were the differences between Athens and Sparta?  
Did the ancient Greeks ever go to war?  
How did the ancient Greeks spend their time?  
How does today's Olympics compare to its ancient origins?  
What did the ancient Greeks leave behind?

Here's a set of pop quiz questions based on your objectives:

### Pop Quiz: Ancient Greece

1. What was a key difference between Athens and Sparta?
  - a) Athens focused on military training, while Sparta valued philosophy and arts.
  - b) Sparta had a democracy, while Athens had a monarchy.
  - c) Athens valued education and culture, while Sparta emphasized military strength.
  - d) Both Athens and Sparta had identical governments and lifestyles.

# How I've used Generative AI recently - (With oversight of each and every one - they weren't all perfect!)



## Created a Podcast of our AI Policy for your delectation

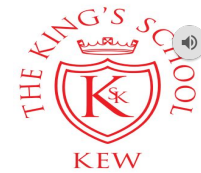


### AI Policy

1 source

This document outlines The King's School's comprehensive **Artificial Intelligence (AI) Policy**, detailing its approach to integrating AI ethically and responsibly within the school community. It establishes **guidelines for staff, governors, and pupils** regarding the use of AI tools, highlighting both their potential to enhance learning and efficiency, and the associated **risks like data protection breaches and intellectual property concerns**. The policy specifies **approved AI tools and their appropriate uses**, while also addressing critical aspects such as **data privacy, intellectual property, bias mitigation, and staff training**. Furthermore, it clarifies **roles and responsibilities** for managing AI, and includes an **AI Tools Staff Agreement** to ensure adherence to established protocols.

# How I've used Generative AI recently - (With oversight of each and every one - they weren't all perfect!)



## Created some Guided Reading questions

(These were fairly generic but such a useful starting point and did still show a knowledge of the book)

### Year 5 Guided Reading Questions: The Queen's Fool by Ally Sherrick

#### Chapter 1

#### Word Reading and Vocabulary

1. Find and copy a word from the chapter that means the same as "worried" or "anxious".
2. What does the word "\_\_\_\_\_" mean in this sentence: "[quote sentence from the text]"?
3. Find three words or phrases the author uses to describe Tudor London.
4. The author uses the phrase "\_\_\_\_\_" on page \_\_. What does this tell us about how Cat was feeling?

#### Drawing Inferences

5. How do you think Cat feels about her father? Use evidence from the text to support your answer.
6. Why do you think Cat decides to \_\_\_\_\_? Give two reasons based on what you've read.
7. Look at page \_\_. How can you tell that Cat is \_\_\_\_\_?
8. What impression do you get of life in Tudor times from this chapter? Use evidence from the text.

#### Prediction

9. Based on what you've read, what do you think might happen to Cat in the next chapter?
10. What clues has the author given us about what might happen next?

# How I've used Generative AI recently - (With oversight of each and every one - they weren't all perfect!)



## Create and edit model texts:

Write a variation on this story. It should follow the same structure, be appropriate for Year 5 and include a warning to the main character.

### The Legend

For years, people had spoken in hushed tones of the statue in St Mary's Cemetery. The stories were well known around town: children lured into the graveyard at night and going missing in the shadow of the granite angel. Some said the children ran away, others that they were devoured by some creature. All agreed that the statue was startlingly beautiful: like a sunrise in heaven. Her long, flowing hair framed a broken smile, with the saddest eyes you have ever seen. She'll get you when you're not looking, they said.

### The Tale

For generations, whispers had circulated about the painting in the old town library. The tales were infamous among the locals: kids drawn to the library after hours, disappearing under the gaze of the oil-painted knight. Some believed the kids simply got lost, others that they were swallowed by some unseen entity. Everyone agreed that the painting was strikingly captivating: like a sunset over a tranquil sea. His short, curly hair framed a melancholic grin, with the most sorrowful eyes you could imagine. He'll ensnare you when you least expect it, they warned.

# How I've used Generative AI recently - (With oversight of each and every one - they weren't all perfect!)

## Write the narrative for a picture



Write the narrative

### The Night of the Floating Frogs

The town was quiet, bathed in the soft glow of the moon. Streetlights flickered, windows stood dark, and the world seemed at rest—until the frogs began to rise.

One by one, they lifted from the pond, their lily pads defying gravity, gliding through the cool night air. Their golden eyes reflected the twinkling stars as they soared above rooftops, watching over the sleeping town below.

No croaks, no splashes—only silence. The frogs did not question their flight, nor did they seem surprised. This was their secret, their moment, the night when the world bent to their will.

pare it back to a bullet point plan with key points

Here's a bullet point plan summarizing the narrative:

- **Setting the scene:**
  - The town is quiet at night, with dim streetlights and dark windows.
  - Everything appears peaceful and still.

# How I've used Generative AI recently - (With oversight of each and every one - they weren't all perfect!)

I created pictures for children to help them visualise what they had planned to write



# How I've used Generative AI recently - (With oversight of each and every one - they weren't all perfect!)



## Made writing frames/ cloze passages for LA writers based on our topic

### What Causes Deforestation?

Deforestation happens when \_\_\_\_\_ are cut down. People remove trees for \_\_\_\_\_, \_\_\_\_\_, and \_\_\_\_\_.

One major cause is farming. Trees are cleared to make space for \_\_\_\_\_ and \_\_\_\_\_, which are used to produce food.

Another cause is logging. This is when trees are cut down for \_\_\_\_\_, which is used to make \_\_\_\_\_ and \_\_\_\_\_.

Land is also cleared to build \_\_\_\_\_ and \_\_\_\_\_, as populations grow and more space is needed.

Sometimes, deforestation happens naturally due to \_\_\_\_\_ or \_\_\_\_\_, which can destroy forests.

To reduce deforestation, people can \_\_\_\_\_, \_\_\_\_\_, and \_\_\_\_\_. Protecting forests is important for the environment and future generations.

# How I've used Generative AI recently - (With oversight of each and every one - they weren't all perfect!)



**Generating a bespoke passage for a grammar starter based on our English text, with punctuation I knew my class needed to work on.**

short passage with subordinate clauses at the start of sentences about a gorgon

Beneath the eerie moonlight, where shadows slithered across jagged rocks, the gorgon waited in silence. Though cursed by the gods, her serpentine locks writhed with a life of their own, hissing softly in the stillness. As whispers of distant travelers reached her ears, she gripped the edge of her lair, her claws scraping against the cold stone. While the air hung thick with dread, her golden eyes gleamed with a predatory hunger, eager for those who dared to approach.



remove the commas

Beneath the eerie moonlight where shadows slithered across jagged rocks the gorgon waited in silence. Though cursed by the gods her serpentine locks writhed with a life of their own hissing softly in the stillness. As whispers of distant travelers reached her ears she gripped the edge of her lair her claws scraping against the cold stone. While the air hung thick with dread her golden eyes gleamed with a predatory hunger eager for those who dared to approach.

**Thank you for  
coming**

**Any questions?**