Key initial questions related to GenAI use in teaching, learning and assessment.

What is GenAI?

Put simply, GenAI is any system which uses AI to 'generate' content on a user's behalf. Where data analytics and AI had previously been focused on analysing text, images, and speech, GenAI **generates new content** based on the user's question, query, instruction or prompt. Thus, GenAI can generate content tailored to a user's needs, requirements or instructions. The content it generates can be in the form of **explanations, plans, process descriptions, questions, images or conversational dialogue.** However, GenAI tools do not always generate fully correct answers and those using GenAI are **advised to read about the risks and restrictions** on its usage.

GenAI has been defined as a **'game changer'** for society (World Economic Forum 2023) with significant implications for higher education. As a result, it is essential that we understand **what GenAI is, how it works, and how GenAI can be used ethically and responsibly** to support teaching, learning and assessment - for which developing AI literacy has become essential.

How do I use GenAI?

There are many GenAI tools available via the web (e.g. ChatGPT 3.5, Microsoft Copilot etc.) which are accessed via a query/conversational interface. These tools typically **ask for a 'prompt'** which is a text space where you can ask a question or give an instruction. To start using GenAI is thus very easy - if you can phrase a query or a question, you can use GenAI. However, to use it effectively requires careful planning and consideration of associated risks and challenges: the guidance and resources provided in this hub will support you through this process.

GenAI tools can generate **eloquent text and convincing images**. However, GenAI tools **do not store facts and knowledge** as we might think about it; rather, they generate outputs based on **probabilities**. Thus, GenAI is prone to making mistakes (called **hallucinations**) which are erroneous facts convincingly presented. This is where **academic judgement and domain expertise** are important. If you are using GenAI, you need to **double-check** the information it is giving you, as it may present information which is simply not true.

Despite the above, GenAI has proven to be a highly effective tool for exploring information, generating activities or plans appropriate for a problem or task, or generating ideas or materials via an interactive dialogue. In the case where the output of GenAI is being used by the user directly in a document or work output, it is important to **cite the usage appropriately** (typically including the date of generation, tool used, and prompt used to create that output).

The format of the citation is dependent on the type of work output or document in which it is being included. Again, it is crucial to check the factual accuracy of any GenAI-output.

For more information on referencing:
https://www.tcd.ie/academicpractice/resources/generative_ai/teaching_and_learning/index.php

What should you NOT do with GenAI?

It is important to understand that some uses of GenAI are **illegal** and break General Data Protection Regulation (GDPR) law. For example, just as you are **not allowed to share private information** about colleagues, students or other personal information on websites or via other electronic means, you are **not allowed to use private student or staff information** as part of your queries or instructions when using GenAI tools. To do so is illegal as you are sharing private information with a third party (the GenAI provider). Most GenAI tools harvest such information and use the interactions with users for training their systems.

Similarly, content which is **confidential** to your studies or work (research, teaching or administrative), **which is not public or for which you do not own the copyright should not be used in creating prompts or providing context information** for GenAI. Again, this is because sharing such information with another party is against College regulations.

What are the key concerns with using GenAI?

There are **several concerns** which users of GenAI should be aware of. GenAI tools are trained on vast amounts of data from a wide variety of sources. Because the training of such tools is not transparent (we do not necessarily know the exact extent of their training sources), GenAI tools **can generate content containing factual errors, exhibit bias, use significant amounts of power resources** when being trained (sustainability) and **harvest information** from a user's prompts and related contextual information. Different GenAI tools vary with regard to these concerns.

What advice should I give students on their use of GenAI?

GenAI will be used by students. It is **impossible to ban the use of GenAI** by students as it is a useful means for them to get extra information about academic subjects as well as other information. Students are advised, in the same way as academics, that GenAI can generate erroneous content, and that information generated from GenAI cannot be considered correct all of the time. Therefore, students are expected to fact-check information that they generate from GenAI when using it to learn or explain subjects.

If a student generates content from a GenAI tool and submits it as their own work, it is considered **plagiarism**, which is defined as academic misconduct in accordance with the College Academic Integrity Policy. If GenAI content is used by a student within their work, it must be referenced. Cases of plagiarism are considered under [College Academic Misconduct Procedures.](#)

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