

Exploring the Possibilities: Creating, Enhancing, and Editing with Artificial Intelligence

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Tierney King 00:01

This is the Faculty Focus Live podcast. This episode is sponsored by the Teaching Professor Online Conference. Join us from the comfort of your own home and transform how you teach with nationally recognized teaching and learning presenters. I'm your host, Tierney King, and I'm here to bring you inspiration, energy and creative strategies that you can utilize in your everyday teaching. Get a notepad or your laptop ready for this episode, because you'll want to write down some of these AI tools we're about to dive into. From using AI to design course materials to supporting students with AI writing and editing. to creating multimedia teaching materials. This episode has something for you, you'll discover how AI can help with translation, image creation, slideshows, and audio or video support. So get ready to unlock the potential of AI and education and take your learning and teaching to the next level with Jeremy Caplan's first of three programs, How Can I Use AI to Draft Course Materials?

Jeremy Caplan 01:01

There are four categories of AI tools that are most relevant for us as educators. The first category is chat-based AI tools. The second is search-based tools. The third is document-based tools. And the fourth is the other category that includes specialty tools and multimedia tools that we'll get to you on another day. Let's focus on those first three categories. The chat-based tools include the original ChatGPT, of course, by open AI, as well as Bard and another tool called Poe. Bard is from Google and Poe is by the makers of Quora. And these chat-based apps basically allow you to have an iterative dialogue with an AI engine. So you are asking a question or asking to provide a prompt, and you are getting back a response. And then you can iterate and follow up on that prompt. So asking follow up questions or asking the AI to offer a more particular answer than the one that did initially. The second category of tools, the search-based tools, include things like Bing AI, which uses the same open AI engine as ChatGPT but allows you to have a search-based interface. The search-based tools also include Google's generative search, which is in development, and other AI-based search tools like perplexity.ai. One of the advantages of these search tools is that they operate in the same kind of direction as Google. So if you're familiar with Google searching, or searching DuckDuckGo, or any other search engine, you'll be familiar with the idea of putting in a search prompt or putting in a query and getting back a response. And with Bing AI, one of the advantages is that, unlike with ChatGPT, you actually do get a link to follow where you can see more about the information that's been provided to you. And in fact, with Bing AI, you can also iterate on the query. So you can ask follow up questions, and improve the query by refining your prompt as you go, as you can do also with Google's generative search, which is building on the Google search engine. The third category of AI tools that are relevant for us as educators are document-based tools. These include resources like Google Docs, which has built in AI at this point, as well as other tools like CODA and Notion, which are new popular document creation tools. Even Craft.do and Canva, those are all document creation tools that now have al engines built in. One of the strengths of this is that are advantages of using these is that you have the material right within your document. So if it's generating some ideas for potential lesson plans, or micro assessments, you have those right alongside a document and you can work with them as you'd work with material in any document. In fact, Microsoft Word will soon have al built into it as well. So just as you'd work with material in any document and tool you already have the AI material built in right inside your document, which can be handy. There are many ways we as educators can make effective use of AI. Starting with the materials that we use in our teaching on a daily, weekly and monthly basis. We can use AI to help us with the syllabi that we use, to summarize what our courses are about and to entice students into the study of the subject matter. We can use the AI to assist us in the development of drafts of lesson plans for new sessions we want to create that are engaging and interactive. We can task the AI with creating rubrics. We can ask the AI to help us with formulating questions for discussion, or outlining case studies that we can use to discuss important topics in class, the sky's the limit. There's so many ways in which we can use AI, and I want to share with you some examples in the moments ahead. We can also use AI to do ordinary things like summarizing feedback that we received from students. So there are just more and more uses that we can come up with for creative ways to bring the Al into our classrooms.

Tierney King 02:10

In addition to using AI yourself, you can also teach your students how they can use AI to strengthen their writing and editing skills. From translating text to feedback on specific topics, there are numerous tools students can use. Jeremy Caplan goes through a few of these tools in his next program, How Can I Use AI as a Student Writing and Editing Coach?

Jeremy Caplan 05:25

Today, I want to share with you some specific ways you can use AI to help your students to strengthen their writing and editing. And we'll talk about what the tools are, how they can be useful, and specific ways you can implement them in your courses. First, let's talk about what the tools actually are. So there's a wide range of tools now that use AI in a variety of different ways. There are chat-based tools like ChatGPT, and Bard from Google, Bing AI from Microsoft, Claude from Anthropic, and each of these tools basically uses a chat interface where there's a box that you can type something into and get answers back. These aren't search engines, instead, they are AI engines, and they basically provide generative text that draws on insights, the computers, the algorithms have essentially learned from ingesting the entire internet or close to the entire internet's content. Now, there are a lot of ethical questions about how students use AI and how we grade student activity. And we won't get into those specific questions. In this video, what we will talk about instead, is how we can use the power of AI to help students strengthen their writing and editing. So in addition to the chat-based tools, there are tools that are within word processing programs. So these include Google Docs, for example, which has now has AI baked into it. Also other tools like Notion AI, Coda AI, Craft, AI. So lots of these tools now have Al built into Word Processing editors. So as students are writing and editing their work, they can draw on AI insights, their specialty tools as well like Lex.page. Even Canva now has a tool called Magic Write that can be used to generate writing with AI. These of course, are not the first tools to have students using them for their writing and editing tools like Grammarly and Hemingway and iA Writer have been around for guite a while and help students with spelling and grammar and basic sentence structure. What the new tools do is they add a layer of further intelligence. Much like a more advanced calculator or computer builds on the most basic calculator that a student might have access to in the past. I want to review a few of the key things that AI can actually do so we're aware of its capabilities. First, it can translate texts. So if a student is working in one language and needs to translate text from another language, or needs to check their own translation of text, AI can help with that task. AI can also help summarize complicated text. There's complicated text in another language or even in scientific terminology, or another some kind of jargon, students can paste in some text and have al summarize that text for them. Al can also be useful in generating ideas as a partner or assistant for the student so the student can generate a list of possible questions to consider in their essay. For example, if they're addressing a complicated subject, the student can ask the AI to help them think through all of the guestions that they should address in a particular section of their essay. The AI can help generate other guestions that other critics might have asked from various different viewpoints about a particular topic. So the student can start to expand their horizons in terms of how they're thinking about a particular topic. The AI can, of course, generate creative texts. We've seen many people generating poems and songs and lyrics in various contexts. But for our purposes, the AI is particularly helpful for suggesting revisions or possible revisions. This can mean spelling corrections, grammatical adjustments, or even giving the students some feedback on specific qualities in their writing. The feedback is also neutral. So this is not a person who they may or may not like giving them feedback. It's an algorithm. It's an Al engine that's providing that feedback. So the student is less likely to feel personally insulted, because it's simply a matter of the AI as an algorithm providing that input. It's also robust. So the AI has so much baked into it, that it understands things like Bloom's Taxonomy, or Porter's Five Forces or the Lean Canvas or the Business Model canvas. So if the student is writing about one of those topics, and asks a question for ask for feedback about whether the Porter's Five Forces have been explained adequately and clearly in this particular paragraph, the AI understands the context of that framework, and can provide feedback and say for example, there are a few questions you might want to consider if you're expanding on that paragraph in your explanation. So the AI can provide constructive input and robust input based on the subject matter.

Tierney King 10:09

Lastly, there are ways you can create multimedia with AI to fit your exact course. From generating specific images to guiding your slideshows to creating AI-generated diagrams to even having AI edit your videos. Jeremy Caplan explains how you can use AI to create multimedia teaching materials in this program.

Jeremy Caplan 10:27

One of the first ways that I think we can all use AI is generating images. So AI generated images are something you can create with tools like Midjourney and DALL-E, even Canva, the popular creation tool has an AI component now that allows you to generate images based on text prompts. So if you haven't

used this before, the idea is basically you give it a sentence that describes what it is you're looking for with as much precision and specificity as you can manage. And the machine, the algorithm, interprets that human language using natural language processing, and understands what your intention is what you're looking for, and provides you with an image or actually a series of images you can choose from that best according to the algorithm matches what you have in mind. So if you are teaching something about medieval history and the role of classical music in that period, you can ask the AI to generate an image that shows a group of musicians playing in a medieval setting in a particular context with particular instruments in a particular setting. And you'll get an image that you can then use in your own teaching that draws on those elements that you've included in your prompt. You can even use AI to generate diagrams. There are tools like Whimsical that now allow you to use a simple prompt describe a particular diagram you have in mind, and get a diagram that you can use to illustrate a concept of process framework. You can obviously edit those, once you generate them. You can then edit them so that they are yours and they are correct and accurate. And yet, you don't have to do all of the initial menial work of putting the information into the diagram initially, so you're getting a draft that you can then work with and improve on. Another valuable way to use AI in your teaching is to generate slides with AI. There are a number of different tools that allow you to use AI in a few different ways. And I want to highlight three specific approaches to using AI and generating slides. First, you can use AI simply to suggest alternative layouts for slides that you've created. So if you're using Google Slides, for example, you can use it suggest mode to select from multiple different versions of that slide. So it's not creating the slide for you. In this case, it's just suggesting a cleaner or more engaging way to to lay out that particular slide. And you can do this with really any slide you've created on Google Slides. Now, you can also use the AI slide design recommendation tool on a tool like Canva, for example, which has a similar capability, suggesting alternative ways to organize the visuals or words on a particular slide that you have. You can choose from one that looks good to you, or that seems cleaner or better conveys the message that you're trying to convey. A second way to use AI for slide generation is to generate individual slides with a prompt. So you can tell a tool like Beautiful.ai that you'd like a slide that illustrates this concept that has these three parts. And the parts of the concept are A, B and C and it will generate a draft of that slide for you, you can then adjust it. You can move things around if you want to, but you get a very quick slide that conveys an idea you have or framework that you're explaining. A third way to use generative AI in generating slides is to ask it in a detailed prompt to generate some initial slides for you for a presentation. So in this case, the AI is doing even more of this initial drafting outlining of something, and with Beautiful.ai and Tome, Journey, and Gamma, these are four different tools you can use to generate a whole batch of initial slides. In the case of some of these tools like Tome, you can give it a document, and Canva you can use this way to you can give it a document that lays out the key aspects of a presentation you're creating like a Google Doc, Microsoft Word document type material, and it will take that material and turn that into visual slides. In addition to creating slides and generating images with AI, you can also use AI to generate audio and video. And in some cases, you may be an educator who doesn't want to appear on screen or you don't want to have your own voice recording an audio message. If that's the case, you can now use AI to essentially take a script and voice it or you can even generate a an avatar that will essentially read a set of instructions or give students a little update on something. And the video avatar can essentially convey a message in a visual way in an engaging way in a live way. That avoids you having to continually be in front of a camera recording if that's not your comfortable place, or if you don't feel eager to continually record audio or video messages. Another important way that you can use AI is to edit audio and video that you develop for a course. So if you're not familiar with professional video or audio editing, and don't want to use tools like Final Cut Pro or Adobe Premiere, which are relatively complicated professional editing tools, you can simply edit the text of your material using new AI capable tools like descript.com. And what these tools allow you to do is simply record into a mic, they turn your recording into a transcript, and then you can edit that transcript just like you'd edit a Microsoft Word document or a Google Doc. So all you have to do is take out the words or edit the words that you want to change, and you'll get a changed edited video or audio recording. You don't have to mess with the actual sound waves or waveforms. You can just edit the text naturally and the video or audio will be edited for you.

Tierney King 16:02

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