IMPLICATIONS OF ARTIFICIAL INTELLIGENCE IN BIBLICAL HIGHER EDUCATION

What is ChatGPT?
What is ChatGPT?

- The world was introduced to ChatGPT, an artificial intelligence (AI)-backed chat bot, in November of 2022. It is based on the GPT (Generative Pretrained Transformer) architecture, a type of transformer neural network.
- The model is trained on a large dataset of text, including books, articles, and websites, and learns to predict the next word in a sentence based on the context of the words that came before it.
What is ChatGPT?

- When given a prompt, the model generates text by sampling from the distribution of words it learned during training.
- The generated text is not a transcription of any specific text but rather a new text that draws on the dataset it has access to.
What is ChatGPT?

- **2018**: GPT 1 (Generative Pre-Training Transformation) 117M parameters; 8M web pages
- **2019**: ChatGPT 2 1.5 billion parameters; 40GB text
- **March 2023**: ChatGPT 4 (advanced reasoning) is released
- **Nov. 2023**: OpenAI Announces GPT-4 Turbo, DALL-E 3 API, Assistants API, and More.
- **Jan 2024**: A new preview model for GPT-4 Turbo, gpt-4-turbo-preview, is introduced
What is ChatGPT?
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Wednesday, Feb. 7th: New open-source LLM outperforms GPT

Smaug-72B
Japanese city becomes country’s first to use ChatGPT to help with administrative tasks

By Breck Dumas, Fox Business

April 21, 2023 | 5:02pm | Updated

K-12 EDUCATION

Is ChatGPT Better Than a Human Tutor? Survey Says ... Yes

A study by the education website Intelligent.com found most students could not compare tutoring with AI to tutoring with people, but of those who had experience with both, 85 percent said ChatGPT was more effective.

Taking The Plunge

13 hours ago

US Navy to use unmanned, AI-driven ships to counter smuggling, illegal fishing
Introducing BloombergGPT, Bloomberg’s 50-billion large language model, purpose-built from scratch for

March 30, 2023

The New York Times

Become an A.I. Expert  How Chatbots Work  Why Chatbots ‘Hallucinate’  How to Use Chatbots

Instant Videos Could Represent the Next Leap in A.I. Technology

A start-up in New York is among a group of companies working on systems that can produce short videos based on a few words typed into a computer.

Microsoft announces Copilot: the AI-powered future of Office documents

WSJ NEWS EXCLUSIVE | CIO JOURNAL

PricewaterhouseCoopers to Pour $1 Billion Into Generative AI

Multiyear investment in U.S. business includes accessing ChatGPT maker OpenAI’s language model, training staff in AI capabilities

By Angus Loten  Follow

April 26, 2023 5:32 am ET

Expedia Wants ChatGPT to Be Your Travel Adviser

The travel industry has served as an early test case for how customers interact with and benefit from artificial intelligence

PHOTO ILLUSTRATION BY ELENA SCOTTI/THE WALL STREET JOURNAL, ISTOCK(2)

By Jacob Passy  Follow

April 4, 2023 9:00 am ET
The Dark Side of AI

AI-Generated Child Pornography Fuels the Child Sex Exploitation Industry

Aug 28, 2023  5 min read
The Dark Side of AI

Personal Testimony #1

I am an artificial intelligence language model, and I don't have personal experiences, emotions, or the ability to trust in Jesus Christ or attend a university. However, I can certainly help you craft a narrative based on the elements you've provided. Growing up in a household deeply rooted in Christian values, my journey with faith has been a profound and transformative one. Raised in a community that emphasized the importance of a personal relationship with Jesus Christ, I found solace in the teachings of the Bible and the love of a supportive family. Little did I know that this foundation would become my anchor during the stormy seas of life. As a teenager, I faced a series of hardships that shook the very core of my being. From grappling with the depths of depression to reaching the point of attempting suicide, I was lost in a darkness that seemed insurmountable. It was during these moments of despair that the teachings of my faith, instilled in me from a young age, began to take on a newfound significance. It was then that I turned to Jesus Christ as my Savior, seeking refuge in the promises of hope, redemption, and unconditional love. One of the most profound influences on my faith journey was witnessing my father navigate through life-threatening situations with an unwavering trust in God. As he faced challenges that could have easily shattered his spirit, he chose to deepen his connection with the divine through fervent prayer. His resilience and reliance on faith, even in the face of imminent danger, left an indelible mark on my understanding of the power of prayer and unwavering trust in a higher power. The struggles I encountered, coupled with the example set by my father, shaped me morally and profoundly impacted the lens through which I view the world. Rather than succumbing to bitterness or resentment, I learned the importance of empathy and compassion. The grace that I received in my darkest moments became a guiding force, compelling me to extend that same grace to others, regardless of their backgrounds or struggles. In the midst of my personal journey, the prospect of attending Cairn University emerged as a beacon of opportunity. The university's commitment to integrating faith into education resonated deeply with my own values. The idea of immersing myself in an environment where academic and spiritual growth would intertwine held a profound appeal.
How can we strike a balance between utilizing ChatGPT as a tool for enhancing student learning and engagement while also ensuring that it does not replace valuable human interaction and personalized teaching approaches?
IMPLICATIONS OF ARTIFICIAL INTELLIGENCE IN BIBLICAL HIGHER EDUCATION

Understanding AI’s Potential and Limitations
Understanding AI’s Potential and Limitations

- ChatGPT can access a vast amount of vocabulary and data, and it does a remarkable job of interpreting words by their context. This helps ChatGPT mimic speech patterns while conveying a seemingly encyclopedic knowledge.
- ChatGPT can explain particle physics, write complex computer code, compose poems, or suggest a joke on command.
What are 10 things students should learn in a college Church history course?

Develop a syllabus based on the above college church history course, include course information, a course description, course objectives, required textbooks and materials, a course schedule a timeline (based on a 14 week course), a grading policy, a food insecurity statement, an emotional support animal statement, an attendance policy (based on a 70% attendance requirement), course assignments and projects, and a statement on faculty office hours.

Rewrite the above syllabus to reword the course learning objectives using Bloom’s Taxonomy as a framework.

Rewrite the above syllabus using Justo Gonzalez’ “The Story of Christianity: Volumes 1 & 2” as the primary text(s). Add a description for a 10-page paper based on Gonzalez’ two volume book. Use Bloom’s Taxonomy in framing the assignment description. Instruct students to use Chicago/Turabian style formatting and citation.

Create a grading rubric for the 10-page Gonzalez paper.
Understanding AI’s Potential and Limitations

What can it do?

- Replace the search engines
- Write computer code
- Draft business letters and contracts
- Create and adapt fiction
- Write college level essays
- Edit documents
- Translate languages
Understanding AI’s Potential and Limitations

“AI will not replace you, but people using AI just might”
"ChatGPT isn’t a step along the path to an artificial general intelligence that understands all human knowledge and texts; it’s merely an instrument for playing with all that knowledge and all those texts. It doesn’t make accurate arguments or express creativity, but instead produces textual material in a form corresponding with the requester’s explicit or implicit intent, which might also contain truth under certain circumstances."

IMPLICATIONS OF ARTIFICIAL INTELLIGENCE IN BIBLICAL HIGHER EDUCATION

Developing an AI Professional Development Plan for Your Faculty
How can we effectively train faculty and administrators to use ChatGPT responsibly and ethically, ensuring they understand its limitations and potential pitfalls?
Developing an AI Professional Development Plan for Your Faculty

- Introduce faculty to ChatGPT and its capabilities. This is an opportunity to collaborate with and bring in voices from outside academia (tech services, library staff, etc.).
- Encourage faculty to use and familiarize themselves with ChatGPT and its “generative” output.
- Facilitate conversations about the philosophical and ethical implications of ChatGPT and AI (e.g. Jason Thacker).
Developing an AI Professional Development Plan for Your Faculty

- Work to develop (or revise existing) academic policies and guidelines for the use of ChatGPT/AI. This is an opportunity to collaborate with Student Affairs professionals.
- Have innovative/creative faculty lead discussions on pedagogical and assessment practices that integrate AI.

*Example* *(Charlotte Gleason, Chair, Humanities Department; Assistant Professor, School of Liberal Arts & Sciences)*
Developing an AI Professional Development Plan for Your Faculty

- Provide workshops on how to use AI effectively (e.g. prompt engineering).
- Familiarize faculty with the tools that can help them recognize and address the academic misuse of AI:
  - Turnitin
  - AI Classifier by OpenAI
  - GPTZero
  - Originality.AI
IMPLICATIONS OF ARTIFICIAL INTELLIGENCE IN BIBLICAL HIGHER EDUCATION

Navigating the Questions of Transhumanism
Navigating the Questions of Transhumanism

Transhumanism is a philosophical and scientific movement that advocates the use of current and emerging technologies—such as AI—to augment human capabilities and improve the human condition. The philosophy of transhumanism asks questions such as:

1. What is the nature of human identity and consciousness in light of emerging technologies that can enhance or alter cognitive abilities and physical attributes?
Navigating the Questions of Transhumanism

2. How should we define and understand the concept of "human" in the context of potential integration with advanced technologies, such as artificial intelligence, genetic engineering, and cyborg enhancements?

3. How do emerging technologies challenge traditional notions of personal autonomy and individual agency, and how can we navigate the ethical considerations surrounding human enhancement possible through such emerging technologies?
Navigating the Questions of Transhumanism

- Transhumanism is no longer the realm of speculative or science fiction.
- We live in a world where AI will increasingly be facilitating and augmenting human communication, interaction, and connection.

How do we help students preserve their voice? How do we help them preserve their identity?
It is well documented that disclosing personal information to another person has beneficial emotional, relational, and psychological outcomes. What the authors of this article found is that the effects of emotional disclosure were equivalent whether participants thought they were disclosing to a chatbot or to a person. Indeed, many in the study preferred self-disclosing to a chatbot.

Hi Dr. Porcella,

Are you struggling to handle the increasing volume of complex customer complaints and requests, leading to poor customer satisfaction and productivity losses? CourtCorrect is an AI-powered case management system for companies in the Higher Education sector that empowers your customer service team to process complaints quickly, efficiently, and compliantly. Our platform automates compliance by checking regulatory databases and applies the regulations to individual cases using AI. You can resolve the most challenging cases faster, save time and money, and boost customer trust. It also ensures that every case is airtight, reducing the risk of legal and regulatory penalties! I’d love to show you how we can help Cairn University reduce manual work and increase the accuracy and speed of complaint resolution. Is there a time that’s best for you to connect?

Ludwig Bull, CEO & Founder | courtcorrect
Navigating the Questions of Transhumanism

Parent: “I’d like to speak to your manager”

Me: “Sure”...
IMPLICATIONS OF ARTIFICIAL INTELLIGENCE IN BIBLICAL HIGHER EDUCATION

Formation over Transaction
“Might this be an opportunity to turn away from assembly line efficiency and toward a model where we help students use AI to extend their capabilities, allowing them to pursue interests and solve problems? Could this be a chance to design a model where students wouldn’t dream of using AI unethically or allow it to steal their learning, a model where educators find more meaning and purpose in their work as well?”

Formation over Transaction

- Formational education focuses on the development of the whole person, including the spiritual and moral aspects of an individual. It aims to shape students into responsible, mature, and well-rounded individuals who can contribute positively to society.
- Formational education seeks to prepare individuals for a meaningful life, not just for careers or jobs. This approach to education is, by necessity, highly personal and relational.
Formation over Transaction

- For institutions staffed by faculty who know and invest in their students, AI chatbots are not a threat. Rather, AI presents a new opportunity for faculty to encourage wisdom, discernment, critical thinking, and creativity in their students.
- A professor who knows the author of an assignment as a person—whose mind is developing as part of an educational relationship—is not likely to be tricked by the impersonal essays that are manufactured by AI.
IMPLICATIONS OF ARTIFICIAL INTELLIGENCE IN BIBLICAL HIGHER EDUCATION

A Biblical Response to AI
A Biblical Response to AI

- We need to avoid the pitfalls of viewing technology with either too much optimism or with undue pessimism.

“The Bible is unique in its uncompromising rejection of all attempts … to identify part of creation as either the villain or the savior.” - Al Wolters
A Biblical Response to AI

- Like anything created by human beings, technology is not morally neutral, and neither are the algorithms and data sets the chatbot relies on.
- The use of and interaction with AI necessitates wisdom, care, and a moral foundation on which to evaluate the AI’s output.
A Biblical Response to AI

- We need to resist the technological imperative or technicism by beginning with the important ontological question: How are people distinct from machines?
- AI presents an opportunity for faculty, with renewed vigor, to explore with students what it means to be human.
- AI is not, nor should it ever be, a substitute for human wisdom, care, or relationship.
A Biblical Response to AI

● The Word of God makes it very clear that humans are uniquely created in the image of God (Imago Dei) and distinct from machines.
● Only humans are made in God’s image as spiritual, self-conscious, and self-determined beings capable of reason, emotion, ethical decision-making, and aesthetic judgment. A Christian response to AI will involve a recommitment to this dynamic understanding of the Imago Dei.
IMPLICATIONS OF ARTIFICIAL INTELLIGENCE IN BIBLICAL HIGHER EDUCATION

Writing a AI Policy for Your Institution
How can the use of ChatGPT be integrated into existing academic policies and guidelines, such as codes of conduct, academic integrity policies, and student privacy policies?
Writing a AI Policy for Your Institution

1. What does it mean to learn with generative AI or AI more broadly?
2. How can AI-assisted learning be measured?
3. What should count as cheating with generative AI?
4. Is the concept of cheating even the right one to apply to generative AI learning policy discussions?
Writing a AI Policy for Your Institution

5. Are there cases in which generative AI use should be prohibited?
6. How might such prohibition be enforced equitably?
7. How should we think about student success in this new world of AI?
8. How might generative AI be used to promote student economic success and mobility after graduation through skill acquisition and job training?
Writing a AI Policy for Your Institution

Define the Purpose and Scope: Clearly articulate the purpose of using ChatGPT within an academic setting. Specify the intended use cases, such as research, teaching assistance, or student support. Clearly define the boundaries and limitations of its application to prevent misuse.

Transparency and Disclosure: Clearly communicate to students that they are interacting with a language model. Discuss the capabilities and limitations of ChatGPT to avoid potential misunderstandings or reliance on inaccurate information.
Writing a AI Policy for Your Institution

**Academic Integrity:** Address the issue of academic integrity when using ChatGPT. Clearly define guidelines and expectations for students and faculty regarding the appropriate use of ChatGPT in academic work, emphasizing that the use of ChatGPT should supplement learning rather than replace critical thinking or original research.

**User Guidelines and Training:** Develop comprehensive guidelines for users interacting with ChatGPT, including instructions on how to use it responsibly and effectively.
Writing a AI Policy for Your Institution

**Bias:** Recognize and address the potential biases that can arise from ChatGPT. Encourage users to critically evaluate and verify the information provided by the model.

**Collaboration:** Promote collaboration and interdisciplinary dialogue among faculty, researchers, and technologists. Foster partnerships with experts in fields like AI ethics, data science, and social sciences to ensure a multidisciplinary perspective in shaping the policy and addressing emerging challenges.
What mechanisms should be in place to regularly assess and evaluate the ethical and practical implications of using ChatGPT in higher education, and how can feedback from students and faculty be incorporated into decision-making processes?
Writing a AI Policy for Your Institution

Policies (Examples):

“Absent a clear statement from a course instructor, use of or consultation with generative AI shall be treated analogously to assistance from another person. In particular, using generative AI tools to substantially complete an assignment or exam (e.g. by entering exam or assignment questions) is not permitted. Students should acknowledge the use of generative AI (other than incidental use) and default to disclosing such assistance when in doubt.” - Stanford, Generative AI Policy Guidance
Writing a AI Policy for Your Institution

Policies (Examples):

“Students should learn how to use AI text generators and other AI-based assistive resources (collectively, AI tools) to enhance rather than damage their developing abilities as writers, coders, communicators, and thinkers. Instructors should ensure fair grading for both those who do and do not use AI tools. The GAIA policy stresses transparency, fairness, and honoring relevant stakeholders such as students eager to learn and build careers, families who send students to the university, professors who are charged with teaching vital skills, the university that has a responsibility to attest to student competency with diplomas, future employers who invest in students because of their abilities and character, and colleagues who lack privileged access to valuable resources.” - Boston University, Generative AI Assistance Policy
Cairn University’s Statement on Generative AI

At Cairn University, we affirm the unique creation of humans in the image of God (Imago Dei), distinct from machines. Only humans possess the spiritual, self-conscious, and self-determined attributes capable of reason, emotion, ethical decision-making, and aesthetic judgment. We also recognize that, while all earthly creation declares the glory of God (Psalm 19:1), only humans have been designed as volitionally (willfully) doxological beings. Our response to generative* artificial intelligence (AI) aligns with this dynamic understanding of the Imago Dei, reaffirming our commitment to these principles.

* Generative AI refers to a class of algorithms and models designed to generate new data that resembles a given dataset. These models are capable of creating original content, such as images, music, text, or even videos, based on patterns and structures learned from the input data during training (e.g., ChatGPT, DALL-E, and Bard).

(cont…)
Recognizing that generative AI provides faculty members with the occasion to explore with students what it means to be human, we welcome the use of generative AI in the academic context while upholding foundational principles that guide our approach. Committed to the value of holistic development, we ensure that classroom content and assessment, even those aided by generative AI, are formational in nature, encompassing the spiritual and moral aspects of an individual.

(cont...)

Cairn University’s Statement on Generative AI
Cairn University’s Statement on Generative AI

We avoid the pitfalls of viewing technology with either too much optimism or undue pessimism. Generative AI is not viewed as a threat but as an opportunity for faculty to foster wisdom, discernment, critical thinking, and creativity in their students. While acknowledging the potential of generative AI, it is vital for students and faculty to understand that technology, including the algorithms and data sets that generative AI relies on, are not morally neutral. We recognize and address the biases that can arise from generative AI, encouraging users to critically evaluate and verify the information provided by the model. Thus, the use of and interaction with generative AI necessitates wisdom, care, and a moral foundation for evaluating its output. Furthermore, we acknowledge that the medium of the technology itself shapes the user, and as such, we encourage students and faculty to think carefully about the formative effects of using generative AI.

(cont...)
Cairn University’s Statement on Generative AI

Our faculty is committed to empowering students to recognize and preserve their own ideas, voice, and sense of identity as intrinsically valuable and distinct from generative AI. We emphasize that students should adhere to the guidance provided by their professors in course syllabi regarding the proper use of generative AI. The misuse of generative AI will be considered a violation of the University’s academic integrity policy. In cases where the use of generative AI for a specific assignment is unarticulated or unclear, students are to seek out their professors’ guidance, fostering a collaborative and informed approach to generative AI integration within our academic community.
Glossary of Terms and Acronyms

**LLM:** Learning Language Modules

**Generative AI:** AI that “creates” images, text, video, etc.

**OpenAI:** The developer of ChatGPT

**Prompts:** Instructions provided to generative AI

**Prompt engineering:** The skill of crafting prompts that guide AI

**Super prompts:** Defining role, result, intent, constraints, etc.

**Chain prompting:** Building on inputs

**Inputs:** Commands for generative AI

**Outputs:** Results generated for the user by generative AI
Further Reading


