AI Educated

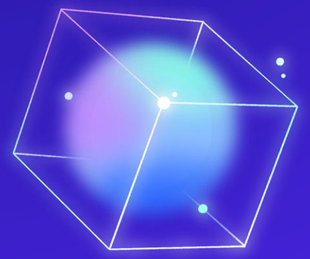
Dr. Al Pisano

This presentation designed to provide educators with practical knowledge about artificial intelligence (AI) and to expand your knowledge and explore real world implementation of AI in education.

My Journey

Educator

Entrepreneur



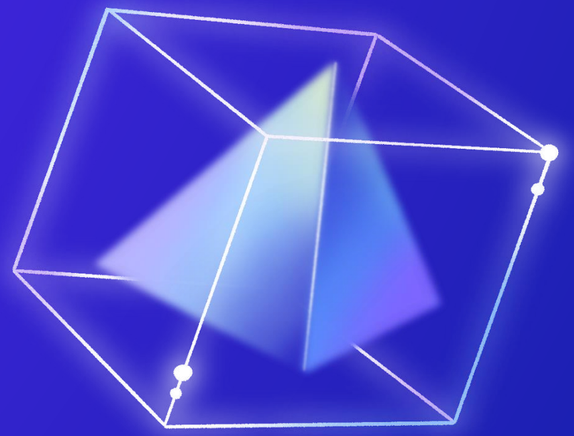
Leader

Researcher

On a scale of 1 to 10 (10 being the highest), what is your level of understanding of AI and it impact and use in education?

Agenda

- AI Fundamentals
- AI Relevance in Education
- AI as an Instructional and Assessment Tool
- Teacher and AI Collaboration
- Generative AI for Education
- Personalized learning with customized courses and materials with AI
- Helping teachers fill gaps in education with AI
- Assistive AI Technology
- Advanced tutoring and Chat Bots with AI
- Ethics and Student use of AI
- Administrative Benefits of AI
- AI Resources



Of the topics listed in the agenda, which one interests you the most? You can also list one that is not on the list that you hope to learn more about.

AI Fundamentals

What is AI?

How AI Works

AI Technologies

What is AI?

- Artificial Intelligence (AI) as the simulation of human intelligence in machines.
- AI systems can perform tasks that typically require human intelligence, such as learning, reasoning, problem-solving, and understanding natural language.

AI Technologies

AI technologies that are relevant in education:

- Machine Learning: Machine learning enables AI systems to learn from data and improve their performance over time.
- Natural Language Processing (NLP): NLP allows AI to understand and interact with human language, making it useful for chatbots and language-related applications.
- Computer Vision: Computer vision enables AI to interpret and understand visual information, which can be applied in areas like image recognition.

How AI Works

The basic working principles of AI:

- **Data Collection:** AI systems collect and analyze vast amounts of data.
- **Data Training:** AI learns from this data to identify patterns and make predictions.
- **Decision-Making:** AI systems use their learned knowledge to make decisions or provide recommendations.
- **Iteration:** AI systems continuously improve through feedback and more data.

Relevance to Education

AI in the education sector:

- **Personalization:** AI can tailor learning experiences to individual student needs.
- **Efficiency:** It can streamline administrative tasks and enhance decision-making.
- **Data-Driven Insights:** AI helps educators gain valuable insights into student performance.

AI as an Instructional and Assessment Tool

AI serves as both an instructional and assessment tool by providing personalized, adaptive learning content and assessing student progress through data analysis and feedback.

AI as an Instructional and Assessment Tool Example: Eduaide.ai

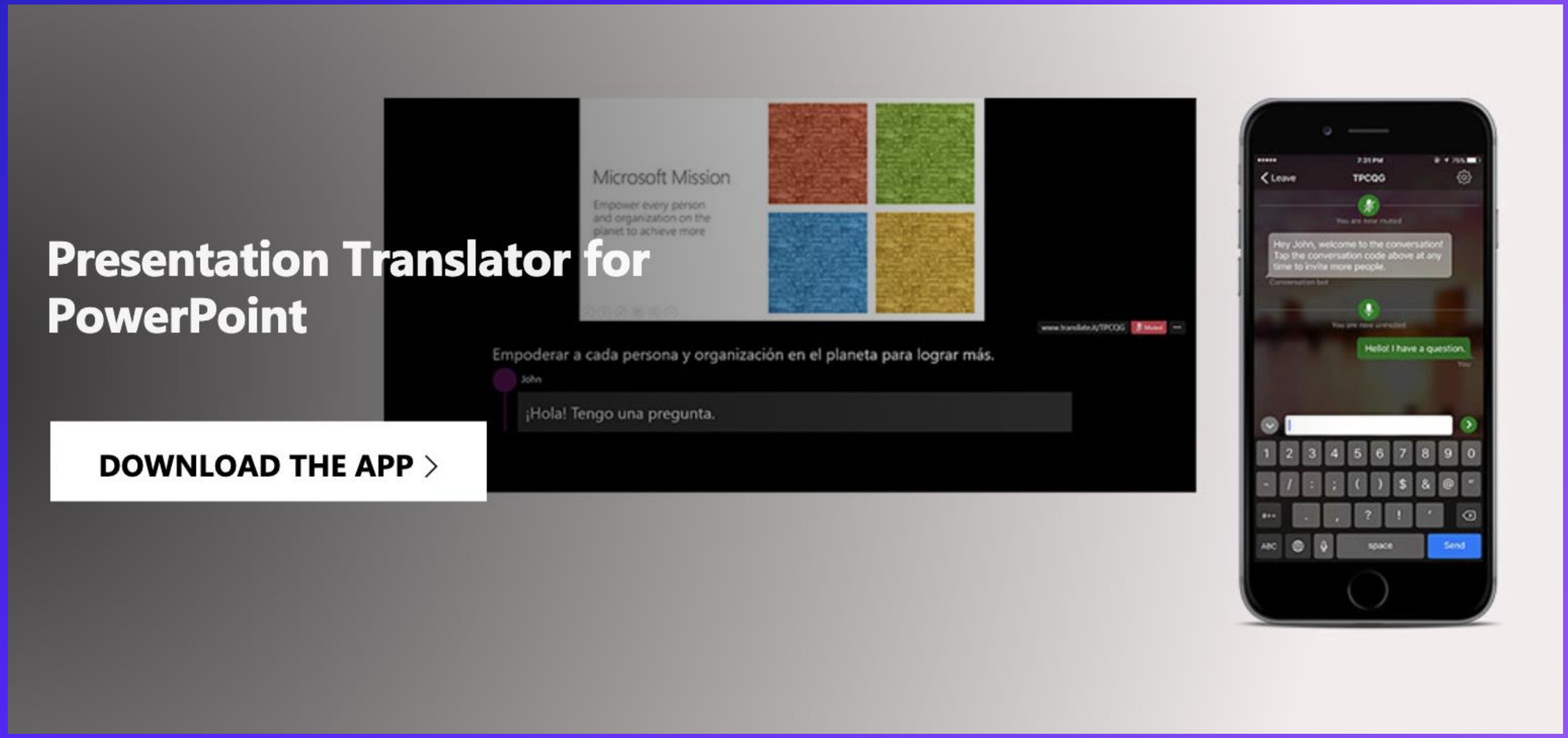
Teacher and AI Collaboration

AI and teachers are increasingly collaborating in education to enhance the learning experience. AI in education envisions a collaborative partnership between machines and educators to enhance student learning. Current AI tools focus on skills and testing but aim to address learning gaps, improve efficiency, and personalize education. This collaboration aims to reduce teacher administrative burdens, allowing more time for essential human skills. It's crucial to expose students to AI for future readiness.

- Education Copilot and other “teacher assistants”
  - Education Copilot, Teacherbot, and Eduaide.AI

Do you have any experience working with or leveraging AI in an educational environment? Cite and example if you do!

AI and Teacher Collaboration Example: Microsoft Presentation Translator



Generative AI for Education

1. Chat Gpt
2. Google Bard
3. Bing Chat
4. DALL-E

Generative AI for Education

- Chat GPT, Google Bard and Microsoft Bing Chat
  - Bard and Bing Chat
- DALL-E, Midjourney, and other art generators
  - Midjourney, OpenAI's DALL-E, Adobe Firefly
- Hello History, Character AI, and other persona chatbots
  - Hello History, Character.AI

Have you used any Generative AI Tools in your classroom or for professional growth? State how if you'd like!

Example: Canva
Design and Image Generator

Canva Design spotlight Business Education Plans and pricing Learn

Education Overview Students Schools Higher education Back to School LMS Integrations Case Studies Education Creator

Inspiring teachers and engaging students

Create and personalize lesson plans, infographics, posters, video, and more. **100% free** for teachers and students at eligible schools.

Teachers

Get verified

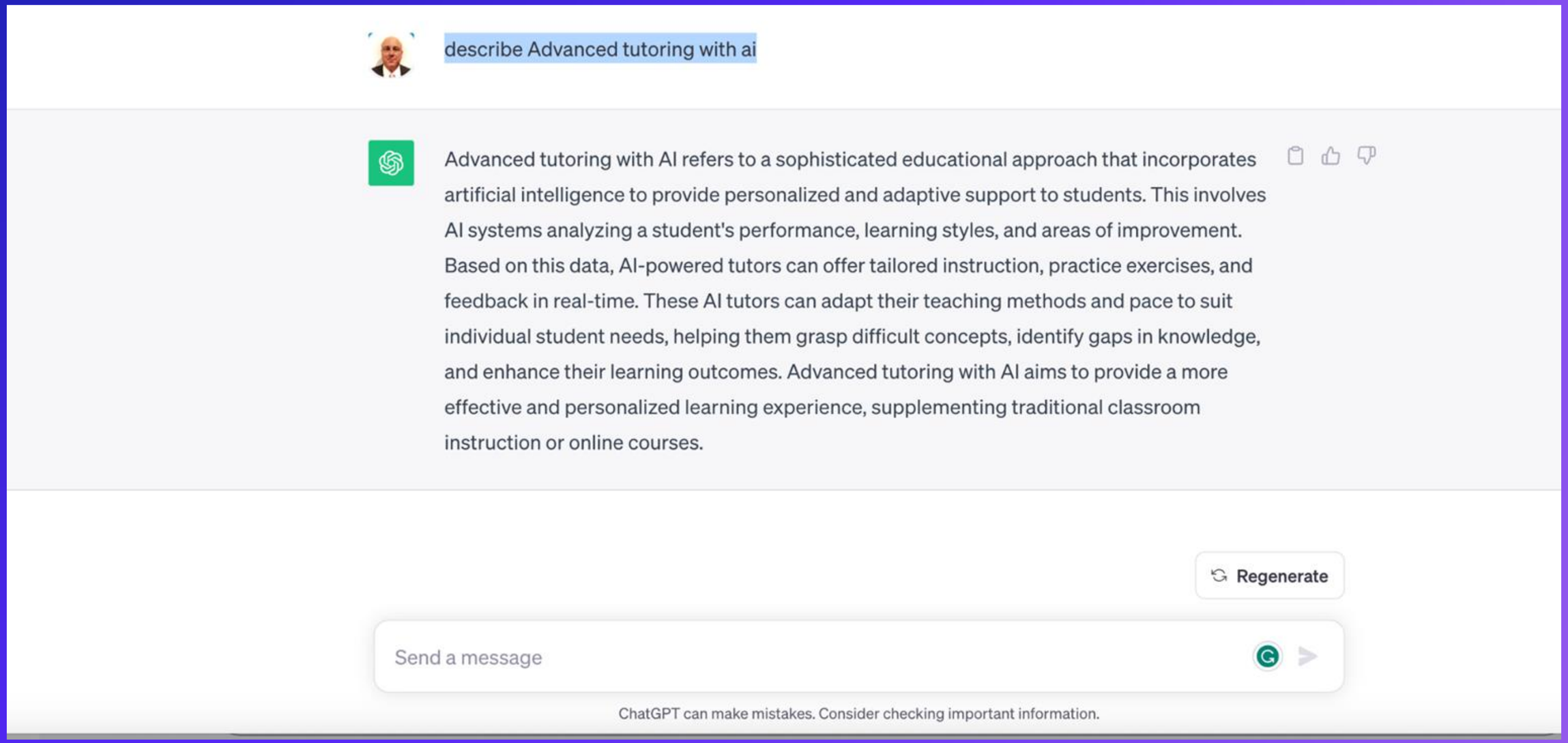
Schools

Contact Us

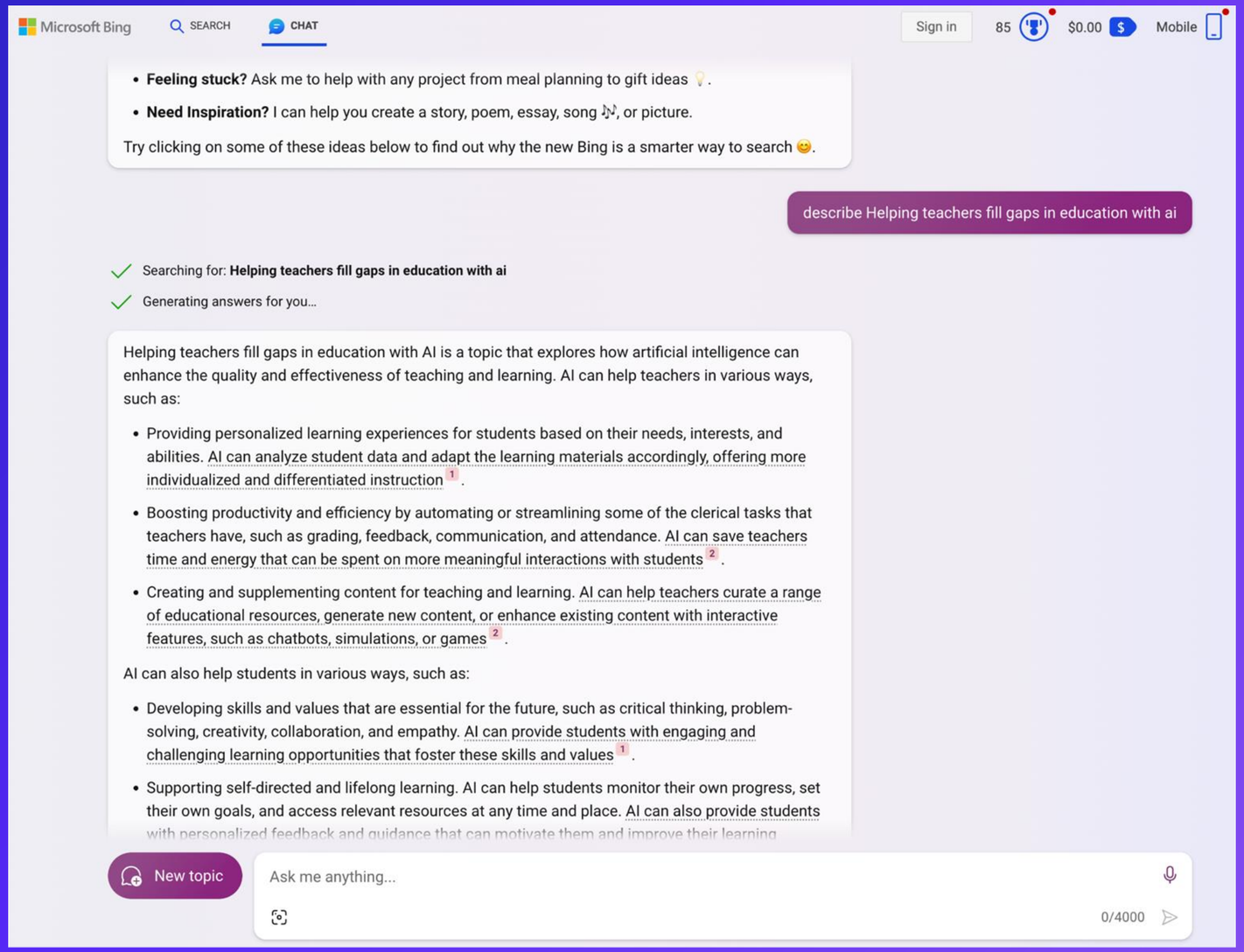
Students

Resources

Personalized learning with customized courses and materials with AI - Chat GP



Helping teachers fill gaps in education with AI - Bing Chat



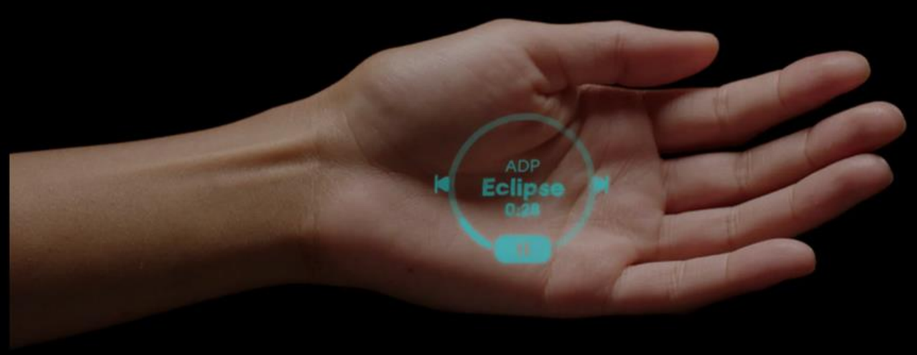
AI Accessibility: What Are AI Assistive Technology Examples?

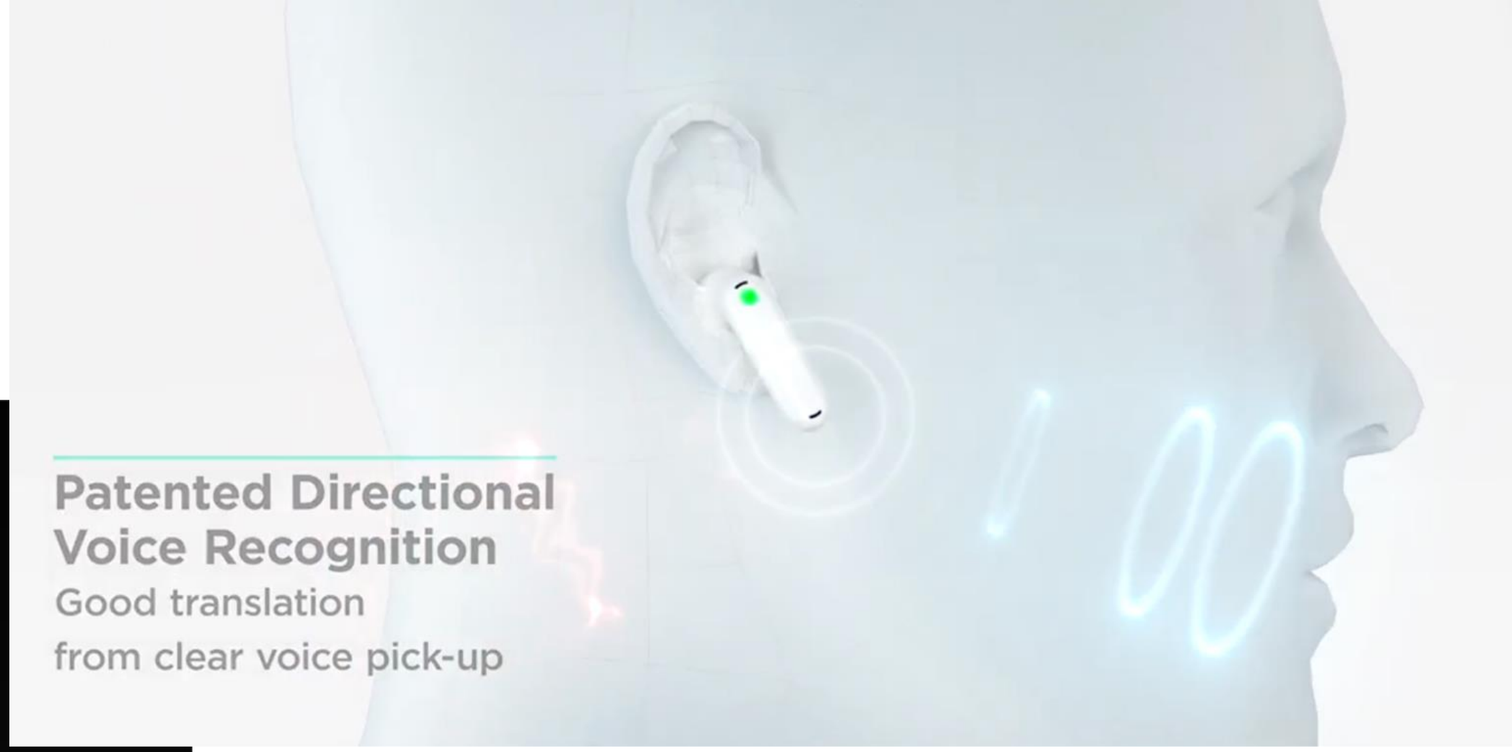
https://www.handtalk.me/en/blog/ai-accessibility/

What are AI assistive technology examples?

- Language caption and translation
- Image recognition
- Facial recognition
- Summarizing information
- Lip reading
- User navigation

AI Pin

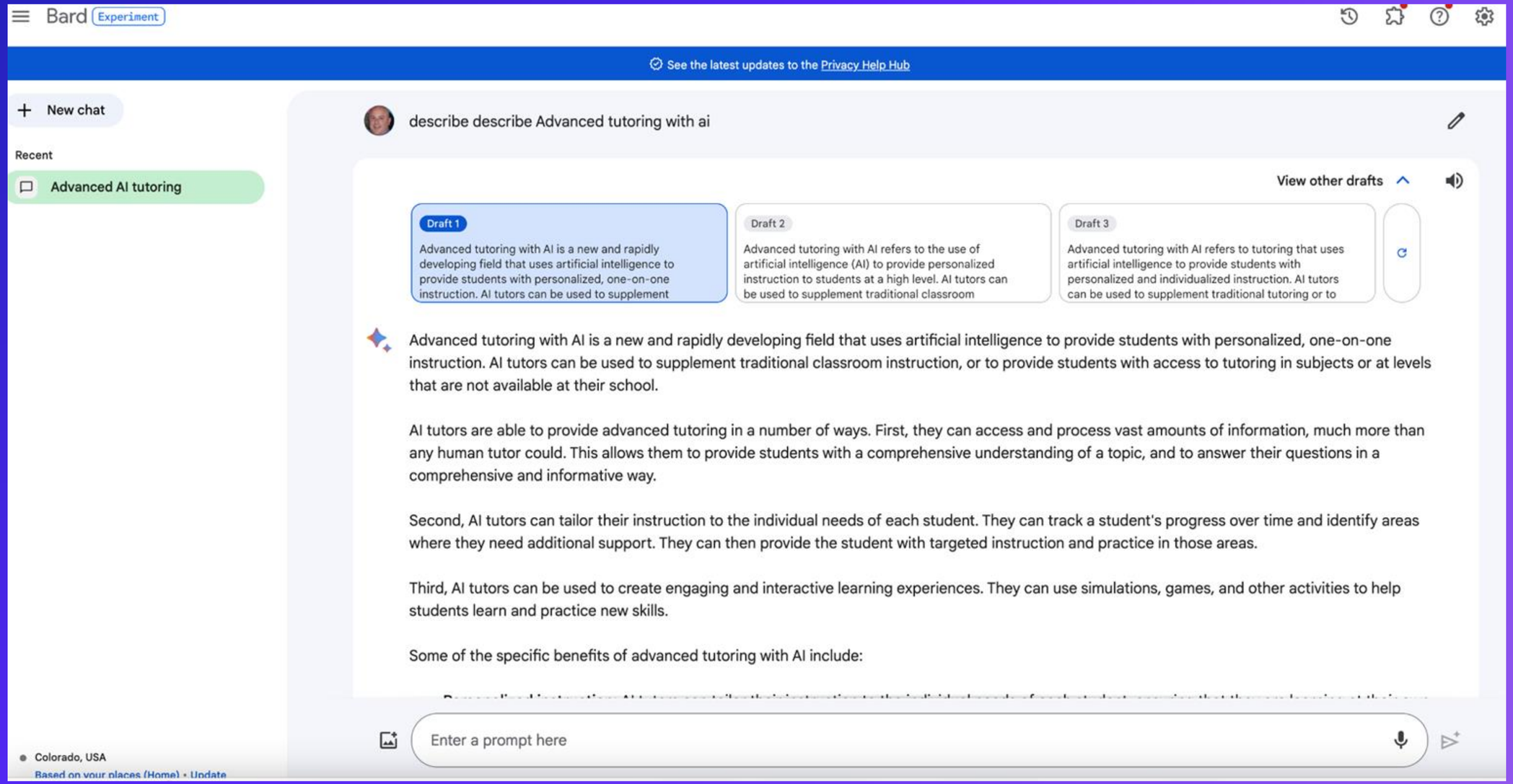




AI Translation Earbuds

Apple Vision Pro - Spatial Computing

Advanced tutoring and Chat Bots with AI - Bard



Student AI Tools

copy.ai

NEWS AND EVENTS

How (and why) to add captions to your YouTube videos

BY **THE YOUTUBE TEAM**

NOV 06, 2023 – 4 MINUTE READ

Grammarly, Inc.

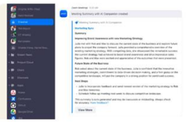
Software company

ZOOM Products Solutions Resources Plans & Pricing Contact Sales Sign Up

Boost how you collaborate, connect, and create

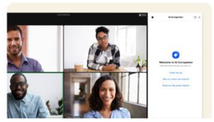
Intelligently process recordings

Consume recordings faster through highlights, smart chapters, summaries, and next steps; enhanced with conversation analytics, topic tracking indicators, and playlists.



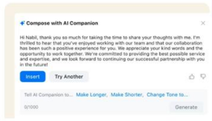
Get meetings summarized

Generate a summary and next steps of what was discussed in your meetings and share via email and Team Chat. Now includes a brief overview at the top of the summary.



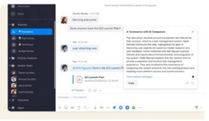
Make queries in a meeting

Quickly catch up and get clarity on what you missed during a meeting without interrupting it.



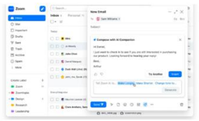
Draft a chat response

Draft chat messages based on conversational context and what you want to say, as well as customize its tone



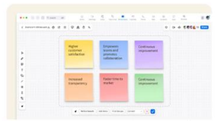
Get chat threads summarized

Generate a brief summary of what was discussed in a long chat thread.



Draft an email response

Write emails faster with suggested content based on context of historical email conversations.



Whiteboard content generation

Generate ideas for your whiteboard as stickies, tables or mind maps. Refine and categorize existing content on whiteboards.

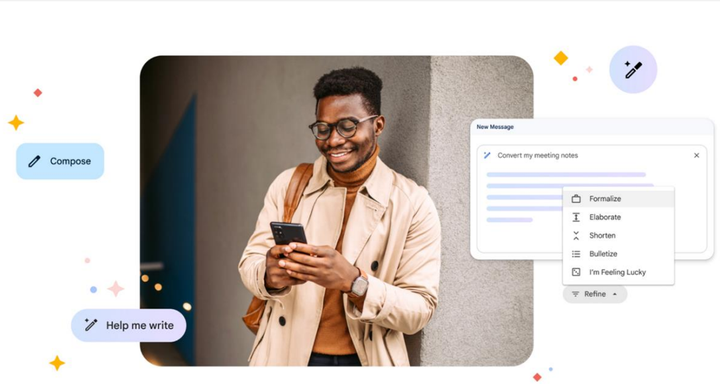
Multi-language support

NEW

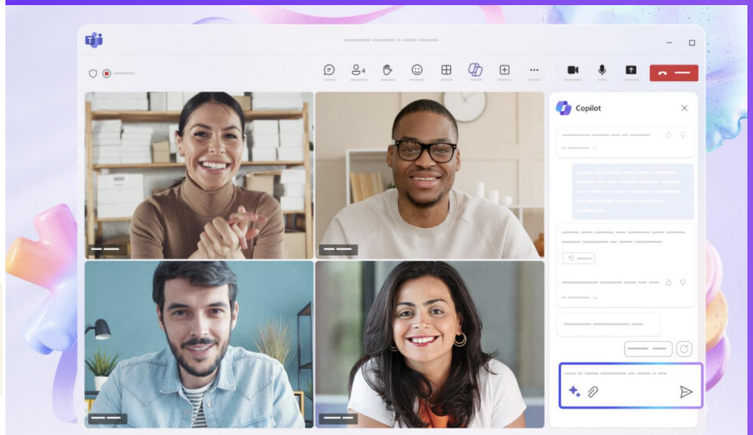
AI Companion in-meeting questions now also supports Spanish, Japanese, French, German, Portuguese, Simplified Chinese, and Italian (in preview).

A new era for AI and Google Workspace

March 14, 2023



Google Workspace



Copilot in Teams

Transform your work with the power of AI

Which of the tools mentioned excite you? Are there other you have used that have not been highlighted? Please share!

Ethics and Student use of AI

Stop pretending that it doesn’t exist:

- Students are well aware that technologies such as ChatGPT exist and are already experimenting with them on their own, but they need guidance about how to use them responsibly.
  - Houman Harouni - Harvard Professor
  - https://www.gse.harvard.edu/ideas/usable-knowledge/23/07/embracing-artificial-intelligence-classroom

Ethical Considerations in AI Education:

- There are ethical challenges AI in education, such as data privacy, **algorithmic bias**, and the need for transparency.
- Responsible AI implementation requires addressing these concerns to protect students and uphold ethical standards.

Encouraging Responsible AI Use:

- Guidance must be provided to promote ethical AI use among students, emphasizing the importance of understanding the technology's impact and potential risks.
- The role of educators in teaching responsible AI practices and digital citizenship must be highlighted often.

Real-World Ethical Dilemmas:

- Students use AI to complete assignments, raising questions about academic integrity.
- Educators and institutions must navigate these challenges while fostering responsible AI usage.
- Educators are using AI to create lessons

Administrative Benefits of AI

Administrators in education can benefit from AI in several ways:

Efficient Task Automation: AI can automate routine administrative tasks, such as data entry, scheduling, and document management. This allows administrators to focus on more strategic and complex responsibilities.

Data Analysis and Insights: AI can analyze large datasets to provide valuable insights into student performance, attendance patterns, and resource allocation. Administrators can use these insights to make data-driven decisions.

Improved Decision-Making: AI can assist in decision-making processes by providing predictive analytics and suggesting solutions based on data. This helps administrators make informed choices to enhance the educational experience.

Enhanced Communication: AI-powered chatbots and virtual assistants can handle inquiries from students, parents, and staff, improving communication and streamlining administrative support.

Resource Allocation: AI can optimize resource allocation, helping administrators allocate budgets, staff, and classroom resources more efficiently.

Personalized Professional Development: AI can recommend personalized professional development opportunities for educators, aligning training with their individual needs and goals.

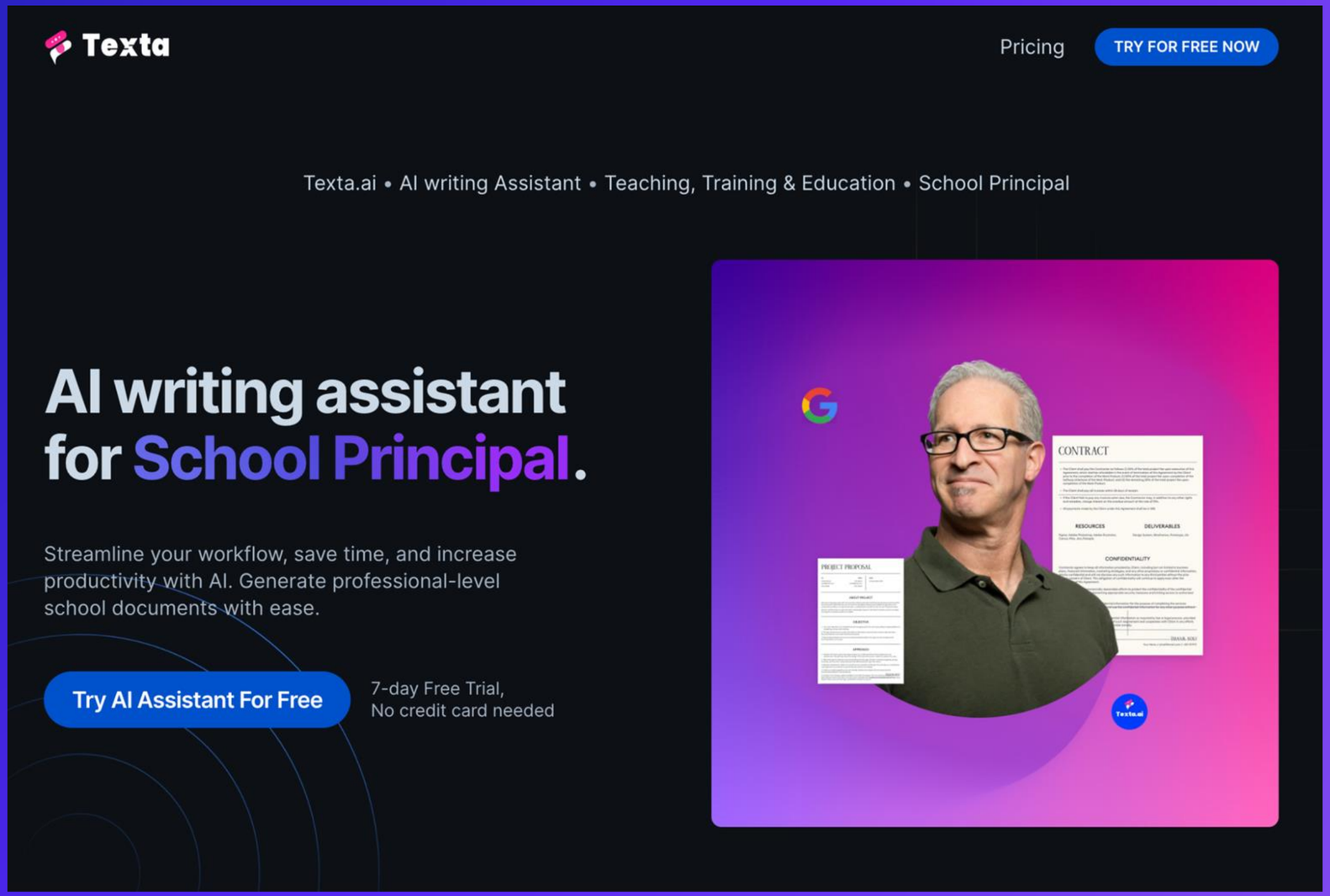
Administrative Support: AI chatbots can help with administrative tasks, answering common questions, providing information, and guiding users to appropriate resources.

Enhanced Security: AI can bolster security measures, protecting student data, and the institution's digital infrastructure from threats.

Streamlined Reporting: AI can automate report generation, reducing the time and effort required for creating, formatting, and distributing reports to stakeholders.

Cost Savings: While there may be initial costs in implementing AI systems, the long-term benefits in terms of time and resource savings can be substantial.

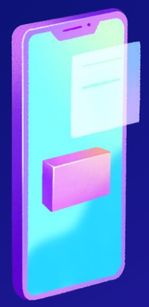
Have you used any Generative AI Tools to help with administrative tasks, emails or documentation? State how if you'd like!

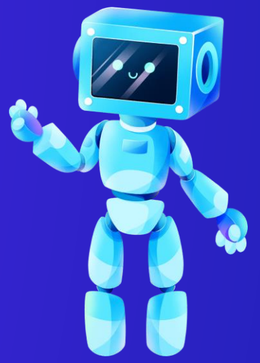


AI for School and District Leaders\

- https://blog.linclearning.com/ai-for-school-and-district-leaders

AI Resources





- From admissions to teaching to grading, AI is infiltrating higher education
  - https://hechingerreport.org/from-admissions-to-teaching-to-grading-ai-is-infiltrating-higher-education/
- How Is AI Used In Education — Real World Examples Of Today And A Peek Into The Future
  - https://bernardmarr.com/how-is-ai-used-in-education-real-world-examples-of-today-and-a-peek-into-the-future/
- Beyond ChatGPT: The Other AI Tools Teachers Are Using
  - https://www.edweek.org/technology/beyond-chatgpt-the-other-ai-tools-teachers-are-using/2023/08
- Office of Educational Technology and AI
  - https://tech.ed.gov/ai/
- 15 AI in Education Examples to Know
  - https://builtin.com/artificial-intelligence/ai-in-education
- Educating in a World of Artificial Intelligence
  - https://www.gse.harvard.edu/ideas/usable-knowledge/23/07/embracing-artificial-intelligence-classroom
- AI Accessibility: What Are AI Assistive Technology Examples?
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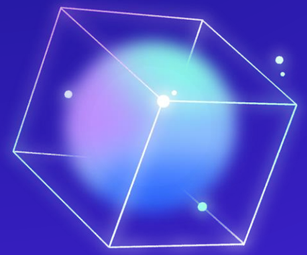

THANK YOU!

Questions?

Connect with me!