



Editorial Article

Chatgpt4, DALL·E, Bard, Claude, BERT: Open Possibilities

Ahmed Hussein Ali^{1,*}, , Mohammad Alajanbi¹, , Mohanad G. Yaseen¹, , Saad Abbas Abed¹, ¹ Department of Computer, College of Education, AL-Iraqia University, Baghdad, Iraq.

ARTICLE INFO

Article History

Received 15 Dec 2022

Accepted 02 Mar 2023

Published 26 Mar 2023

Keywords

ChatGpt

Bard

Claude

Dall-e

Bert



ABSTRACT

The past year has seen explosive growth in artificial intelligence systems[1] aimed at augmenting human creativity in unprecedented ways. Systems like OpenAI's ChatGPT and DALL-E 2, Google's Bard, Anthropic's Claude, and natural language models like BERT have demonstrated the rapid pace of progress in this field[2, 3]. Their capabilities to generate human-like text, create original images from text descriptions, answer complex questions, summarize documents, and more seemingly expand by the day. These AI tools mark a shift from systems focused purely on optimizing for accuracy towards models adept at more subjective, ambiguous, and open-ended tasks. This more flexible approach better captures the complexity of language, creativity, and cognition. The results are systems with which we can brainstorm ideas, get unbiased feedback, develop stories, design prototypes, and enhance our own creative output.

For writers, the implications are particularly exciting. AI writing assistants like ChatGPT[4] can suggest plot points to break through writer's block, while Claude can provide notes to strengthen logical flow or fill gaps in knowledge. Systems like DALL-E[5] unlock visualize stories and worlds once left purely to imagination. For researchers and academics, assistants can greatly enhance productivity by summarizing papers, answering questions, checking citations, and more. Of course, while promising, these systems have limitations in understanding context, evaluating factual accuracy, and handling sensitive topics appropriately. Integrating ethics and oversight is critical as this technology continues maturing. Upfront transparency by providers about capabilities and limitations sets proper user expectations.

But looking ahead, AI has incredible potential to augment individual creativity, productivity, and knowledge. These tools don't replace human ingenuity but rather remove friction from accessing our own creativity. Much like other revolutionary technologies before them, they can open possibilities previously closed off to many. The promise lies not in what AI can do alone, but what it allows us to do better. Overall, this new generation feels like a key milestone in constructing AI that enhances our capabilities rather than replaces them

1. CHATGPT

Text generation and dialogue abilities make ChatGPT adept as a writing assistant. It can help brainstorm ideas when facing writer's block, suggesting plot points or character background details that spark new directions. As a dialogue partner, writers can try out character voices and dynamics to see what flows well. For student writers learning structure, ChatGPT can provide examples for comparison. Importantly, it gives fast feedback without judgment, allowing writers to be more adventurous exploring unconventional directions.

2. DALL-E

This image generator allows instant visual realization of creative concepts. Writers can bring to life characters, settings and scenes from stories through AI-generated images. These visualizations can reveal new directions by surfacing details not obvious when left purely to text descriptions. For graphic content creators like video producers, DALL-E's ability to create original images from short text prompts makes developing engaging visual components far more accessible. Beyond writing, it enables prototype design, ad concept visuals, icon creation and more based solely on descriptions.

*Corresponding author. Email: ahmed.ali@aliraqia.edu.iq

3. BARD

As a question-answering system, Bard could greatly aid writers building convincing fictional worlds and narratives. Writers can query backgrounds in history, science, cultures or other domains to ensure accuracy and realism in their stories. Bard can answer highly specific questions on narrow topics, allowing integration of subtle factual details. It also provides citations to source material for additional research. For non-fiction writers, Bard takes on many needs of an intelligent research assistant.

4. CLAUDE

With Claude's ability to summarize content, writers have support condensing and organizing extensive research material into concise overviews before writing. Using Claude's feedback and suggestions during editing could notice holes in plot logic, character consistency issues, or areas needing improvement in the strength of arguments made. As an AI assistant focused on positive and helpful dialogue, Claude enables writers to productively brainstorm story ideas out loud to spur creativity.

5. BERT

As a pioneering natural language model, BERT enabled more human-like syntactic handling of language, a key capability for AI writing tools. It advanced contextual understanding in text, powering abilities like answering questions based on implicit meaning. Building off these natural language advances, ChatGPT, Claude and others can better help human writers thanks to stronger language comprehension. With its robust set of pretrained abilities applicable across many language tasks, BERT paved the way for the explosion in creative AI writing tools today.

The open-domain nature and subjective handling of tasks by these AI systems create new opportunities. Of course, we must integrate ethics, address limitations, and carefully manage expectations around these models as they continue rapidly evolving. But the possibilities to augment human creativity by removing friction seem endless. AI is unlocking our creative potential in unprecedented ways.

Conflicts Of Interest

The paper highlights that there are no conflicts of interest, either personal or professional, that influenced the research process or outcomes.

Funding

The absence of any funding statements or disclosures in the paper suggests that the author had no institutional or sponsor backing.

Acknowledgment

The author extends gratitude to the institution for fostering a collaborative atmosphere that enhanced the quality of this research

References

- [1] E. Adamopoulou and L. Moussiades, "An overview of chatbot technology," in *IFIP international conference on artificial intelligence applications and innovations*, 2020, pp. 373-383: Springer.
- [2] M. U. Hadi et al., "Large language models: a comprehensive survey of its applications, challenges, limitations, and future prospects," 2023.
- [3] M. T. Baldassarre, D. Caivano, B. Fernandez Nieto, D. Gigante, and A. Ragone, "The Social Impact of Generative AI: An Analysis on ChatGPT," in *Proceedings of the 2023 ACM Conference on Information Technology for Social Good*, 2023, pp. 363-373.
- [4] D. Gala and A. N. Makaryus, "The utility of language models in cardiology: a narrative review of the benefits and concerns of ChatGPT-4," *International Journal of Environmental Research and Public Health*, vol. 20, no. 15, p. 6438, 2023.
- [5] A. Kucharavy et al., "Fundamentals of Generative Large Language Models and Perspectives in Cyber-Defense," *arXiv preprint arXiv:2303.12132*, 2023.