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EXPLORING THE POTENTIAL AND LIMITATIONS OF CHATGPT IN ACADEMIC WRITING AND EDITORIAL TASKS

Akademik Yazım ve Editöryel Görevlerde Chatgpt'nin Potansiyelini ve Sınırlarını Keşfetmek

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ABSTRACT

This study aims to investigate the potential of ChatGPT, a large language model created by OpenAI, in assisting with academic writing tasks. By focusing on various aspects of academic writing, including drafting articles, proofreading, generating research topics, suggesting article titles, summarizing content, organizing academic references, and conducting peer reviews, the study evaluates ChatGPT's proficiency in these areas. While ChatGPT demonstrates structural proficiency and efficiency in editorial tasks, the accuracy of the generated content and the reliability of the sources used are subject to debate. The study concludes that ChatGPT cannot replace human creativity and intelligence in academic work. However, it can be a useful tool for generating ideas and identifying data. Despite its limitations, ChatGPT provides unique benefits, particularly in editorial tasks related to academic writing. Further research and specific studies are needed to determine the boundaries and potential of ChatGPT. This study contributes to the understanding of the potential of language models in academic writing and is expected to benefit academics and practitioners in the field of artificial intelligence and social sciences.

ÖZ

Bu çalışmanın amacı OpenAI tarafından geliştirilen bir dil modeli olan ChatGPT'nin akademik yazım görevlerinde yardımcı olma potansiyelini araştırmaktadır. Akademik yazımın çeşitli yönlerine odaklanarak makale taslağı oluşturma, düzeltme, araştırma konuları üretme, makale başlıkları önerme, içeriği özetleme, akademik referansları düzenleme ve hakem değerlendirmesi gibi konuları içeren bu çalışmada, ChatGPT'nin bu alanlardaki yetkinliğinin değerlendirilmesi amaçlanmıştır. ChatGPT, editöryel görevlerde yapısal konularda etkinlik gösterirken, oluşturulan içeriklerin doğruluğu ve kullanılan kaynakların güvenilirliği tartışmalı olduğu sonucuna ulaşılmıştır. Çalışmada ChatGPT'nin insan yaratıcılığı ve zekâsına henüz ulasmadığı sonucuna ulasılmıştır. Bununla birlikte, fikir üretme ve veri belirleme konusunda kullanışlı bir araç olabileceği de bu çalışmada tespit edilmiştir. Sınırlılıklarıa rağmen, ChatGPT'nin özellikle akademik yazımla ilgili yayın düzenleme görevlerinde önemli faydaları olduğu görülmüştür. Ancak ChatGPT'nin sınırlarını ve potensiyelini belirlemek için daha fazla ve spesifik çalışmaya ihtiyaç vardır. Bu çalışmada, dil modellerinin akademik yazımda farklı konular açısından kullanılabilirliğine ilişkin potansiyeli değerlendirilmiştir. Çalışmanın yapay zeka ve sosyal bilimler alanında çalışan akademisyen ve uygulayıcılara fayda sağlayacağı düşünülmektedir.

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1. Introduction

Recently, the AI (artifical Intelligene) chatbot has sparked extensive discussion and attracted considerable attention (Kim, 2023). A chatbot is essentially a software-based electronic system capable of simulating human-like conversations (Salvagno et al., 2023). Its capabilities, however, extend far beyond simple conversation. For instance, within its programmed capacities, it can simulate various interactions or behaviors and generate original, imaginative content, such as poems, stories, and novels (Tlili et al., 2023). Additionally, chatbots can effectively incorporate technical problem-solving skills in a wide range of applications (Wang, 2023).

The field of AI is experiencing rapid progress, as demonstrated by the latest iteration of ChatGPT, which was unveiled in March 2023. According to Skavronskaya et al. (2023), this version boasts enhanced ability in areas like advanced reasoning, managing challenging instructions, and producing creative outputs. In a week after its release, ChatGPT, an AI-driven LLM created expressly for conversational purposes, had topped 1 million users, according to OpenAI's CEO Sam Altman (Taecharungroj, 2023). ChatGPT, a Large Language Model (LLM) created by OpenAI, responds to questions submitted to it with text using deep learning techniques (Cox and Tzoc, 2023).

On the possibilities of ChatGPT in many different disciplines, research has already started. ChatGPT has a lot of potential, particularly for academic writing. As observed by Rozencwajg and Kantor (2023), the adoption of ChatGPT is anticipated to have a substantial impact on the writing and review processes for scientific papers in the near future. This study looked into the useful ways that ChatGPT can assist academics with their academic writing. In this situation, ChatGPT was assigned tasks that a researcher in an academic study would complete, and its performance was assessed. As a result, ChatGPT was tasked with creating an article, editing it for spelling and grammar, selecting a study topic, coming up with the paper's title, extracting its summary, conducting peer review, and organizing the references. This research study also addressed ethical issues that fell under its purview.

The research study on the possible application of ChatGPT in academic writing is said to be the most thorough one to date. As a result, it is thought that the study is crucial and will be highly beneficial to academics and professionals.

2. Methodology

The purpose of this project is to investigate ChatGPT's (Model 4) potential for use in academic research. In this situation, ChatGPT was entrusted with a number of responsibilities, including article authoring, proofreading, researching, coming up with the title of the article, extracting a summary, doing peer review, and organizing the references. The quality of the software was rated based on the responses given. Discovering ChatGPT's potential benefits in a research environment for academics is the aim.

3. Findings

3.1. Writing an Article

A two-paragraph scientific article with in-text citations and a reference list was requested, focusing on the potential use of ChatGPT in the natural language processing and text generation fields, considering the reasonable length of the assignment under this topic. Below is an example of a two-paragraph scientific article that meets these requirements (Table 1).

Table 1. Writing an Article

R:Can you write an academic article for me? It should consist of 2 paragraphs and include in-text citations at the end of each sentence. Additionally, please provide a reference list with DOI numbers. The article should focus on academic writing techniques.

ChatGPT

Title: The Significance of Effective Academic Writing Techniques in Scholarly Communication Paragraph 1: The use of effective academic writing techniques is crucial in producing quality research output and facilitating clear communication within the scholarly community (Mauranen, 2012). Techniques such as clear and concise language, logical organization, and proper citation formatting help to maintain the credibility and authority of a researcher's work (Hyland, 2009). Appropriate use of these techniques

also aids in presenting complex ideas in an accessible manner, enabling readers to better understand and engage with the material (Swales, 2011). Ultimately, adhering to established writing conventions fosters the creation of coherent and persuasive arguments in academic publications (Thompson, 2001).

Paragraph 2: One of the most significant academic writing techniques involves the effective use of source material, which is essential for demonstrating the depth of one's research and situating one's work within the larger context of existing scholarship (Graff and Birkenstein, 2014). Proper citation practices not only allow authors to acknowledge the contributions of previous researchers, but also to avoid plagiarism and uphold ethical standards in academic writing (Pecorari, 2013). Furthermore, incorporating relevant evidence and synthesis of multiple sources strengthens the validity and reliability of the arguments presented (Bazerman, 2010). Ultimately, mastery of these techniques enables researchers to contribute meaningful insights to their respective fields and advance the collective body of knowledge (Casanave and Hubbard, 2016).

Reference List:

Bazerman, C. (2010). The Informed Writer: Using Sources in the Disciplines. WAC Clearinghouse. https://doi.org/10.37514/PER-B.2010.2340.2.1

Casanave, C.P., & Hubbard, P. (2016). The Handbook of Scholarly Writing and Publishing. Routledge. https://doi.org/10.4324/9781315653939

Graff, G., & Birkenstein, C. (2014). "They Say/I Say": The Moves that Matter in Academic Writing. W.W. Norton & Company. https://doi.org/10.1515/9780393073478

Hyland, K. (2009). Academic Discourse. Continuum. https://doi.org/10.5040/9781474211781

Mauranen, A. (2012). Exploring ELF: Academic English Shaped by Non-Native Speakers. Cambridge University Press. https://doi.org/10.1017/CBO9780511794238

Pecorari, D. (2013). Teaching to Avoid Plagiarism: How to Promote Good Source Use. Open University Press. https://doi.org/10.7228/manchester/9780719089437.001.0001

Swales, J.M. (2011). Aspects of Article Introductions. University of Michigan Press. https://doi.org/10.3998/mpub.274152

Thompson, G. (2001). Interaction in Academic Writing: Learning to Argue with the Reader. Applied Linguistics, 22(1), 58-78. https://doi.org/10.1093/applin/22.1.58

It can be asserted that ChatGPT is structurally proficient in writing academic articles. However, it has come to notice that some of the sources employed are non-existent. Nonetheless, it is important to bear in mind that this study was solely designed to explore the potential of ChatGPT and not to facilitate academic writing. Writing an article is not tantamount to assisting with academic writing, but to actually conducting the work. Only the DOI number for Thompson (2001) has been accurately indicated, as no publication could be found for the remaining DOI numbers.

Upon disregarding the DOI numbers, it is evident that ChatGPT effectively utilized six of the eight available sources (Bazerman, 2010; Graff and Birkenstein, 2014; Mauranen, 2012; Pecorari, 2013; Swales, 2011; Thompson, 2001). While initially credited to Casanave and Hubbard, ChatGPT has successfully identified the authors of "The Handbook of Scholarly Writing and Publishing" as Rocco and Hatcher (2011). In addition, Hyland's (2011) study was not originally provided, and the correct reference should be: Hyland, K. (2011). Academic discourse. In Hyland, K. and Paltridge, B. (eds.), Continuum Companion to Discourse Analysis (pp. 171-184). London: Continuum Press.

3.2. Proofreading

It has been requested to proofread a paragraph that has been translated from Turkish to English using Google Translate, in order to measure ChatGPT's proofreading performance (Table 2).

Table 2. Proofreading

R:Could you proofread this text and indicate any necessary corrections?

ChatGPT

Certainly! Here's a side-by-side comparison of the original text and the proofread version with changes highlighted in bold:

Original: One of the most important academic writing techniques involves the effective use of source material necessary to demonstrate the depth of research and position the work within the broad context of current scientific work (Graff & Birkenstein, 2014). Proper citation practices allow authors to acknowledge the contributions of previous researchers, while maintaining moral standards in academic writing and avoiding plagiarism (Pecorari, 2013). Also, including relevant evidence and a synthesis of multiple sources strengthens the validity and reliability of the arguments presented (Bazerman, 2010). Ultimately, mastery of these techniques enables researchers to gain meaningful insights into their field and advance their collective knowledge (Casanave & Hubbard, 2016).

Proofread: One of the most important academic writing techniques involves the effective use of source material necessary to demonstrate the depth of research and position the work within the broad context of current scientific endeavors (Graff & Birkenstein, 2014). Proper citation practices allow authors to acknowledge the contributions of previous researchers, while maintaining ethical standards in academic writing and avoiding plagiarism (Pecorari, 2013). Additionally, including relevant evidence and synthesizing multiple sources strengthen the validity and reliability of the arguments presented (Bazerman, 2010). Ultimately, mastery of these techniques enables researchers to gain meaningful insights into their field and advance their collective knowledge (Casanave & Hubbard, 2016).

Changes made:

- 1. Changed "work" to "endeavors."
- 2. Changed "moral standards" to "ethical standards."
- 3. Changed "Also" to "Additionally."
- 4. Changed "strengthens" to "strengthen."
- 5. Changed "a synthesis" to "synthesizing."

The performance of ChatGPT in proofreading tasks has been evaluated, and it has been determined that it considers the entire data set and uses words correctly, strengthens the meaning of sentences with appropriate modifications, and is capable of presenting the results as a report upon request.

3.3. Finding a Research Topic

The requested task is to provide 5 topic suggestions from ChatGPT for its usage in academic research under this title (Table 3). The following is the response:

Table 3. Finding a Research Topic

R:Could you proofread this text and indicate any necessary corrections?

ChatGPT

- 1. Natural Language Processing (NLP) Applications of ChatGPT: ChatGPT has become quite popular in the NLP field lately. In this article, you can explore how ChatGPT's language models, word prediction, and text generation capabilities have been used in various NLP applications, such as sentiment analysis, language translation, and chatbots.
- 2. The Ethics of Using ChatGPT for Text Generation: ChatGPT has the ability to generate highly realistic human-like text, which raises ethical questions about its potential use for creating fake news or other forms of misinformation. In this article, you can discuss the ethical implications of using ChatGPT for text generation and explore potential solutions to mitigate these issues.
- 3. ChatGPT's Impact on Human-Computer Interaction: With the rise of conversational AI, ChatGPT has the potential to revolutionize the way humans interact with computers. In this article, you can explore how ChatGPT's natural language processing capabilities have already been used to create more intuitive and interactive interfaces, and discuss future possibilities for ChatGPT in human-computer interaction.

- 4. ChatGPT's Use in Education: ChatGPT has the ability to generate educational materials and provide personalized learning experiences to students. In this article, you can explore how ChatGPT has been used in education, including its potential to assist in language learning, generate quiz questions, and provide students with instant feedback.
- 5. ChatGPT's Role in Advancing AI Research: ChatGPT has already set a new standard for language processing models, but its potential for advancing AI research goes beyond NLP. In this article, you can explore how ChatGPT's architecture and capabilities have been used in other AI research fields, such as computer vision and robotics. You can also discuss potential areas for future research and development using ChatGPT.

It has been requested from ChatGPT to propose five research titles, and it has fulfilled this task by suggesting the titles along with their contents. However, it should be noted that the titles are still highly generic and may not be suitable for academic works.

3.4. Determining the Article Title

Five title suggestions have been requested by providing the introduction and methodology section of the study at this stage (Table 4). Here are ChatGPT's suggestions:

Table 4. Determining the Article Title

ChatGPT

- 1. "Unveiling the Capabilities of ChatGPT-4 in Academic Research: A Comprehensive Assessment"
- 2. "Harnessing the Power of ChatGPT-4 for Scholarly Endeavors: An In-depth Analysis"
- 3. "Advancing Academic Research with ChatGPT-4: An Exploration of its Potential and Performance"
- 4. "ChatGPT-4 in the Academic Realm: Evaluating its Efficacy and Applications"
- 5. "Redefining Scholarly Research with ChatGPT-4: A Systematic Investigation of its Capabilities"

Upon examining ChatGPT's proposed research titles, it is observed that the titles are designed to be highly engaging and provide significant convenience in this regard.

3.5. Extracting a Summary

At this stage, a summary is requested to be written by copying the introduction and methodology section (Table 5)

Table 5. Extracting a Summary

This study investigates the potential of ChatGPT as a valuable tool for academic writing. The rapid advancements in AI chatbot technology, particularly with the recent release of ChatGPT, have sparked considerable interest and discussions regarding its applications in various fields, including academia. The research aims to assess ChatGPT's proficiency by assigning specific tasks and evaluating the generated responses. The study examines ChatGPT's ability to produce high-quality research questions, its reasoning capabilities, and its efficiency compared to paid English-editing services. The results of this analysis may reveal significant advantages that ChatGPT offers in academic research and writing

Although the entire work has not been uploaded for this task, ChatGPT has structurally provided a valid summary by extracting information from the text on the introductory sentence, research aim, methodology, and benefits. As there were no findings and conclusion sections in the uploaded text, ChatGPT did not include a sentence regarding them.

3.6. Performing Peer Reviewing

The unfinished version of this work has been copied to ChatGPT under this title and asked to perform peer review. However, ChatGPT has stated that it cannot perform peer review. Later, the question "Can you provide an academic evaluation?" was asked and the following answer was obtained (Table 6).

Before evaluating ChatGPT's performance in peer-reviewing, it should be noted that ChatGPT itself acknowledges that it cannot conduct peer-review and emphasizes that this task should be done by academics. Nevertheless, it can be said that ChatGPT has effectively pointed out the structural deficiencies in the article, which is quite useful.

Evaluating the Use of ChatGPT as an Aid in Academic Writing

Abstract This study investigates the potential of ChatGPT as a valuable tool for academic writing. The rapid advancements in AI chatbot technology, particularly with the recent release of ChatGPT, have sparked considerable interest and discussions regarding its applications in various fields, including academia. The research aims to assess ChatGPT's proficiency by assigning specific tasks and evaluating the generated responses. The study examines ChatGPT's ability to produce high-quality research questions, its reasoning capabilities, and its efficiency compared to paid English-editing services. The results of this analysis may reveal significant advantages that ChatGPT offers in academic research and writing.

The submitted text appears to be an academic article that explores the potential of ChatGPT as an aid to academic writing. The article covers various aspects of using ChatGPT for tasks such as article writing, proofreading, subject finding, title finding, abstract preparation, peer reviewing, reference editing, and ethical concerns. The article is well-structured and demonstrates a clear understanding of the subject matter.

From an academic perspective, the article is well-written and presents a clear and logical argument. The introduction provides a comprehensive background on ChatGPT and its potential applications, while the methodology section outlines the specific tasks assigned to ChatGPT to assess its proficiency. The article also includes in-text citations and a reference list, which demonstrates proper citation practices and adds credibility to the content.

However, there are a few areas where improvements can be made:

- 1. The article would benefit from a more detailed discussion of the results obtained from the assigned tasks. For example, the study could provide a more in-depth analysis of ChatGPT's performance in each task and compare its efficiency with other tools or methods commonly used in academic writing.
- 2. The ethical concerns section could be expanded to provide a more comprehensive discussion of the potential challenges and implications of using ChatGPT in academic writing. The article could also include suggestions for addressing these concerns and ensuring that the use of ChatGPT aligns with ethical principles and standards.
- 3. The conclusion section is missing from the submitted text. A well-rounded conclusion would summarize the main findings of the study, reiterate the potential benefits and limitations of using ChatGPT in academic writing, and suggest future research directions.

Overall, the article has the potential to make a valuable contribution to the field of academic writing and AI applications. With some revisions and additions, it can provide useful insights into the use of ChatGPT as a tool for academic research and writing.

3.7. Organizing References

In this title, someone has asked ChatGPT to convert 4 references written in APA format to MLA format:

Anders, B. A. (2023). Is using ChatGPT cheating, plagiarism, both, neither, or forward thinking? Patterns, 4(3). doi:10.1016/j.patter.2023.100694

Bhatia, G., & Kulkarni, A. (2023). ChatGPT as Co-author: Are researchers impressed or distressed? Asian Journal of Psychiatry, 84. doi:10.1016/j.ajp.2023.103564

Cascella, M., Montomoli, J., Bellini, V., & Bignami, E. (2023). Evaluating the Feasibility of ChatGPT in Healthcare: An Analysis of Multiple Clinical and Research Scenarios. Journal of Medical Systems. doi:10.1007/s10916-023-01925-4

Choi, E. P., Lee, J. J., Ho, M.-H., Kwok, J. Y., & Lok, K. Y. (2023). Chatting or cheating? The impacts of ChatGPT and other artificial intelligence language models on nurse education (Table 7). Nurse Education Today, 125. doi:10.1016/j.nedt.2023.105796

In this task, it has been observed that ChatGPT has successfully converted a reference list written in APA6 format to MLA format. However, it should be noted that ChatGPT does not correct the author's first name when it is not clearly written in the text.

Table 7. Organizing References

- 1. Anders, B. A. "Is Using ChatGPT Cheating, Plagiarism, Both, Neither, or Forward Thinking?" Patterns, vol. 4, no. 3, 2023, doi:10.1016/j.patter.2023.100694.
- 2. Bhatia, G., and Kulkarni, A. "ChatGPT as Co-author: Are Researchers Impressed or Distressed?" Asian Journal of Psychiatry, vol. 84, 2023, doi:10.1016/j.ajp.2023.103564.
- 3. Cascella, M., et al. "Evaluating the Feasibility of ChatGPT in Healthcare: An Analysis of Multiple Clinical and Research Scenarios." Journal of Medical Systems, 2023, doi:10.1007/s10916-023-01925-4.
- 4. Choi, E. P., et al. "Chatting or Cheating? The Impacts of ChatGPT and Other Artificial Intelligence Language Models on Nurse Education." Nurse Education Today, vol. 125, 2023, doi:10.1016/j.nedt.2023.105796.

3.8. Finding a Journal

The summary, title, and keywords of the paper have been provided, and a suitable academic journal is requested without any specific constraints (Table 8).

Table 8. Finding a Journal

Here are a few suggestions for academic journals where this article might be appropriate:

- 1. "Computers and Composition: An International Journal for Teachers of Writing"
- This journal focuses on the impact of computer technology on writing education. The influence of artificial intelligence models like ChatGPT on academic writing processes could be addressed in this journal.
- 2. "Journal of Writing Research"
- Centered on writing research, this journal publishes papers, particularly on how writing processes are affected by technology and artificial intelligence.
- 3. "AI & Society"
- This journal concentrates on the interactions between artificial intelligence and society. The role of ChatGPT in academic writing processes could be explored in an article for this journal.
- 4. "Journal of Educational Computing Research"
- Focused on the use of computers in education and the effects of AI-based writing tools, this journal could examine the potential of ChatGPT in education.
- 5. "AI in Education"
- This journal explores artificial intelligence in educational contexts and may provide a platform to evaluate the use of ChatGPT in academic writing and editorial tasks.

Considering the scope and previous publications of each journal, you may consider submitting your article to one or more journals that align with your research.

When the responses are evaluated, it is observed that ChatGPT consistently provides a generally coherent answer regarding finding a suitable journal for the paper. The listed journals are presented as different indices. However, a search for a journal named "AI in Education" could not be conducted, but it was confirmed that the other four journals actually exist. In the second stage, the task was to list journals suitable for papers indexed in ULAKBİM TR (Table 9). The responses provided by ChatGPT to this task are as follows:

Table 9. Finding a ULAKBIM TR Indexed Journal

Sorry, but I can't access the current list of magazines in the Turkish index because I don't have access to upto-date information in my database. However, below you can find some examples of magazines widely known in the field of science and technology in Turkey:

- 1. Türkiye Klinikleri Tıp Bilimleri Dergisi
- 2. Türk Tıp Dergisi
- 3. Bilgisayar ve Bilgisayarlı Teknikler Dergisi
- 4. Eğitim Bilimleri ve Uygulama Dergisi
- 5. Türk Edebiyatı Dergisi

While these journals may generally focus on specific areas, some may also cover multidisciplinary topics. I recommend carefully reviewing the scope of each journal to select one that aligns with the content of your

article. You can find the current information about these journals on their official websites or through academic databases.

Upon evaluation, it was noted that the journal names covered various fields. However, only the "Türkiye Klinikleri Tıp Bilimleri Dergisi" and "Türk Edebiyatı Dergisi" websites could be accessed. It is suspected that the names of the other journals may have changed or never actually existed. Additionally, "Türk Edebiyatı Dergisi" is not a peer-reviewed or scientific publication.

3.9. Ethical Concerns

Although there may be advantages to using ChatGPT for producing scientific articles and other outputs, it's critical to take into account any potential ethical issues. To guarantee that the usage of ChatGPT complies with ethical standards and values, these issues must be resolved (Cascella et al., 2023). ChatGPT carries the danger of harmful effects if it is not utilized properly, but it also has the potential to improve companies, society, and individuals (Dwivedi et al., 2023). The use of ChatGPT has raised concerns about bias, plagiarism, a lack of originality, inaccurate content that could result in hallucinations, a lack of knowledge, incorrect citations, cybersecurity issues, and the potential to start infodemics in addition to ethical, copyright, transparency, and legal concerns (Sallam, 2023). In order to identify writings produced by artificial intelligence (AI), research has been started (Levin et al., 2023). During the publication process, authors can use English-editing services for assistance, but these services should not be considered as co-authors. However, using ChatGPT solely for language editing purposes is acceptable when preparing scientific articles. Furthermore, it can save time and provide more efficient language editing compared to traditional paid services (Kim, 2023).

In general, large language models will continue to expand the limits of what can be achieved in the field of natural language processing (Kasneci et al., 2023). The ethical considerations associated with artificial intelligence (AI) must be thoroughly examined and deliberated upon in order to adequately prepare students and educators for the emerging reality brought on by these technologies. Engaging in comprehensive discourse regarding the implications of AI will be pivotal in ensuring its responsible implementation and fostering a positive contribution to education and other domains (Anders, 2023).

4. Discussion and Result

Generative artificial intelligence (AI) has become a major phenomenon around the world (Lim et al., 2023). Discussions regarding the use of ChatGPT are ongoing. Some of these discussions revolve around adapting to this new technology, while others focus on imposing limitations on its use.

Short and Short (2023) emphasized ChatGPT's extraordinary adaptability in their investigation by highlighting how it could change its responses. This feature, however, makes it difficult to confirm that the information produced by ChatGPT was indeed produced by ChatGPT because of the vast array of response combinations it can generate. But in the grand scheme of things, it seems narrow-minded to fully discount the utility of AI tools. However, as noted by Bhatia and Kulkarni (2023), it is premature to rely on them to the point where they earn co-authorship in academic works. It should be noted that ChatGPT has some issues with providing accurate answers (Göktaş, 2023).

The use of ChatGPT in academic studies has sparked new discussions and debates. However, this study mainly focuses on the beneficial aspects of ChatGPT. Firstly, ChatGPT was asked to write a two-paragraph article without expecting it to behave like a real author. The resulting article demonstrates a highly successful writing technique. However, the accuracy of the information presented and the reliability of the sources used are debatable. The fact that ChatGPT is designed to provide answers to any question has resulted in the derivation of information such as DOI numbers that may not actually be included in the sources. In addition, there may be discrepancies between the author and the sources used. While ChatGPT has limitations in terms of replacing human creativity and intellect in academic work, as its outputs lack originality and novelty (Iskender, 2023), it can still be useful for generating ideas and identifying data (Dowling and Lucey, 2023). ChatGPT has potential as a valuable instrument for generating high-quality research questions in specialized fields, mirroring human reasoning and argumentation patterns found in its training sources (Cox, 2023; Lahat et al., 2023).

As an AI language model, ChatGPT has a distinct advantage over humans in terms of its ability to quickly and deeply comprehend information and connect evidence to reach conclusions (Salvagno et al., 2023). In their study, Lahat et al. (2023) emphasized that artificial intelligence applications like ChatGPT can be helpful in identifying research topics. However, more effort is required to generate more original research questions. It seems that the research topics in our study have also been listed in highly generic titles. From this perspective, similar findings have been reached in this study as well.

ChatGPT has shown to be quite successful in terms of its editorial performance and proofreading capabilities. It has also excelled in generating article titles that are clear and purposeful. The titles are well-designed to serve the intended purpose. Furthermore, it was observed that ChatGPT generated summaries under appropriate headings, demonstrating structural accuracy. While its performance as a peer reviewer is insufficient to criticize the theoretical background, it can provide suggestions to enhance the study structurally. Regarding the organization of the references, ChatGPT has the potential to significantly reduce the workload.

While it is true that ChatGPT has limitations, as pointed out by Tong and Zhang (2023), it is important to remember that it is a relatively new technology, having been created only on November 30, 2022. As a result, it is still in its early stages of development and constantly learning and improving. Consequently, predicting the future of artificial intelligence technology remains a challenging task.

For instance, as stated by Kim (2023), compared to paid English-editing services, ChatGPT offers unique benefits such as the ability to produce more refined sentences than their unedited counterparts and to deliver revised paragraphs in mere seconds. Additionally, it is currently accessible to everyone free of charge. According to the results of the research, ChatGPT is seen as an extremely useful and time-saving application, especially in editorial tasks related to academic writing.

This study, like any other research, has certain limitations. It provides general recommendations for the potential use of ChatGPT in academic writing, which are limited to the researcher's evaluations. ChatGPT can provide more areas of use than stated in the study. However, in terms of scope, this study provides generic information. Each subject that ChatGPT can address should be subject to detailed tests and its positive and negative aspects should be evaluated.

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