



Proceeding Paper

Influence and Philosophical Reflection on ChatGPT in the Media Industry [†]

Yufan Xia, Beibei Wang and Qinglan Wei *

School of Data Science and Media Intelligence, Communication University of China, Beijing 100024, China; xiayufan2021@cuc.edu.cn (Y.X.); wbb2022@cuc.edu.cn (B.W.)

- * Correspondence: qlwei@cuc.edu.cn; Tel.: +86-138-1176-2853
- [†] Presented at Forum on Information Philosophy—The 6th International Conference of Philosophy of Information, IS4SI Summit 2023, Beijing, China, 14 August 2023.

Abstract: This paper explores ChatGPT's influence and the philosophical reflections it has inspired in the media industry. As a state-of-the-art large language model with powerful text generation capabilities, ChatGPT can help people better understand and process large amounts of information, thus affecting the information ecology. This article points out that ChatGPT has a wide range of application values in areas such as language translation, which can promote international exchanges and cultural integration, and that it can have a positive impact on China's strengthening of its international communication capacity. However, the application of ChatGPT also brings some problems, such as the spamming of false information and the spread of English-language data infiltration. In order to give full play to the value of ChatGPT and make full use of the unique advantages of human beings when using AI, we need to pay attention to the construction of counterfeit detection technology, strengthen media literacy training, and pay attention to the collaborative creations of human beings and machines that promote the realization of cultural value.

Keywords: media industry; ChatGPT; natural language processing; translation; cultural exchange; false information; AI and human uniqueness



Citation: Xia, Y.; Wang, B.; Wei, Q. Influence and Philosophical Reflection on ChatGPT in the Media Industry. *Comput. Sci. Math. Forum* **2023**, *8*, 8. https://doi.org/10.3390/cmsf2023008008

Academic Editors: Zhongzhi Shi and Wolfgang Hofkirchner

Published: 10 August 2023



Copyright: © 2023 by the authors. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (https://creativecommons.org/licenses/by/4.0/).

1. Opportunities

In contemporary philosophy, the informational turn refers to people's attention to and emphasis on information, as well as the impacts of information on human society. This turn emphasizes the fundamental position of information and regards it as one of the important driving forces for the development of human society. The emergence of ChatGPT is highly related to the informational turn. For one thing, ChatGPT has strong text generation capability, and it can help people better understand and process large amounts of information. In November 2022, ChatGPT was officially launched. Within two months, the number of monthly active users quickly exceeded one hundred million, making it the fastest-growing consumer application and causing a huge change in the information ecology. The norms of information ethics, the sharing of information resources, the expansion of information technology, and the creation and dissemination of information culture are all of concern for the survival and development of every individual in the "information circle" [1]. For another, the relationship between humans and machines has entered a new stage of intelligent communication. Unlike other forms of technology, ChatGPT can fully utilize its tool function and deeply embed itself into human daily life, enabling the parasocial interaction between humans and ChatGPT to form a stronger real-world influence [2]. This article will focus on exploring the influence of and philosophical reflections about ChatGPT in the media industry against the background of the contemporary philosophical information turn.

As a state-of-the-art large language model, ChatGPT can simulate human thinking processes and understand and process natural language. It uses Transformer, and has been

trained on a large-scale corpus, making it capable of generating text for multiple tasks. The universality and high precision of ChatGPT bring opportunities to various industries.

Its application scenarios are extensive, especially in the translation industry. ChatGPT can generate content for multilingual audiences with high efficiency and relatively high quality at a lower cost.

With its excellent ability to recognize and process multiple languages, ChatGPT has great significance in promoting international communication. It has become a bridge across cultural barriers, enabling people to communicate more effectively and accurately across borders. In addition, ChatGPT can provide important background information on different cultural traditions and customs, helping to overcome cultural differences and promote understanding of different cultures. By providing users with a comprehensive understanding of cultural elements (such as traditional Chinese classics and ancient values), ChatGPT helps build a more harmonious global community and promotes an open and inclusive form of cultural exchange and dissemination.

For China, ChatGPT can be a good multilingual translation tool to output traditional Chinese culture in more authentic language through faster and lower-cost methods. It will create favorable conditions to build up China's international communication capacity and strengthen the international discourse system. Culture disseminators can actively set topics and use languages and styles that are closer to those employed by overseas audiences. It will enhance the international community's attention to Chinese themes, Chinese stories, Chinese voices, Chinese wisdom, and Chinese solutions.

Philosopher Ludwig Wittgenstein once said, "The limits of my language mean the limits of my world." ChatGPT has used a large number of language datasets for training, which means that it not only functions like an encyclopedia, but that it can also help with cross-border cultural exchange. Using it is equivalent to having access to most human knowledge and culture, which is also an important contribution to the significance of the large language model. The "creativity" or "innovative ability" of ChatGPT is essentially a quantitative change supported by supercomputing power, and it is also the preset of human intelligence, like Heidegger's "technological vehicle" [3].

2. Problems

From the perspective of communication, ChatGPT has brought about several problems. The ChatGPT language model, as one of the representatives of chatbots, participates in public communication activities both as a producer of information and as a medium of information dissemination. While empowering the field of communication, it may also trigger and expose some social communication problems, which should draw our attention.

2.1. Penetration of English-Language Data into ChatGPT

It is widely acknowledged that the vast majority of ChatGPT training data comes from English-speaking countries with corresponding Western values, which may exacerbate its inherent biases and prejudices, leading to the further dissemination of Western values worldwide. Although biased and discriminatory data have been screened out, the remaining bias in the data is difficult to detect and can subtly influence public perception. This may also worsen by the phenomenon of excessive trust in ChatGPT, further promoting the infiltration of these values. Therefore, the establishment and optimization of high-quality Chinese data integration institutions have significant importance, but the modern Chinese internet still faces challenges, such as a poor ecological environment and limited data quantity. The following is an analysis of problems in Chinese data platforms.

1. Deterioration of the Chinese internet ecosystem

One of the reasons for the lack of Chinese training data is the deterioration of the Chinese internet ecosystem, which has manifested in the reduction of high-quality platforms and user engagement. For instance, the previously popular "Four Major Chinese Forum Sites", such as Tianya and Mop, have lost their former activity levels, and high-quality vertical platforms, such as Sogou Science and Guoxue Dictionary, have disappeared without

a trace. Nowadays, Zhihu has become one of the few active and high-quality platforms left in China. Another manifestation of the deterioration of the internet ecosystem is the decline in platform quality. Over 90% of the information on Weibo and Tieba, which also belong to the "Four Major Chinese Forum Sites", is now covered by low-quality self-media, marketing accounts, and fake followers; even on Zhihu, only a few discussions on scientific topics are logical and rigorous.

2. The relatively small size of the Chinese data stock

Another reason for the lack of Chinese training data is the relatively small size of the Chinese data stock, which does not provide sufficient support for large-scale artificial intelligence applications due to the shortage of Chinese data. For example, if only 1% of a database containing 10 million records can be used for AI training, then only 100,000 records of valuable data can be used for training. In contrast, the English-language data stock is large enough to provide far more training data, even after filtering. Furthermore, due to the Matthew effect as it applies to data, this gap will continue to widen.

2.2. Misdistribution of False Information

The powerful ability of ChatGPT to generate text based on given prompts and its self-organizing and adaptive language-logic learning ability may lead to an increase in the dissemination of false information. Criminals can use generative AI models to forge texts, images, and even videos with lower costs and higher efficiency, engaging in fraudulent, threatening, defamatory, and other criminal activities. At present, there have been some cases of crimes committed using generative AI. For example, since the release of Stable Diffusion in 2022, someone has used it to generate large amounts of pornographic images, which were spread on various social forums. Recently, the cybersecurity platform GBHackers revealed a case where a hacker used ChatGPT to commit fraud: the hacker used ChatGPT to quickly generate complete scripts, then packaged ChatGPT as a "virtual character" to deceive users. It can be expected that with the increasing maturity of related technologies, there will be more and more similar cases [4].

Trust is the cornerstone of healthy social operation. On the one hand, a large amount of false information produced by ChatGPT entering the public opinion arena may exacerbate the uncertainty pervading the current era and even lead to a crisis of trust in social communication institutions. ChatGPT will make the media environment more complex, and it will become more challenging to differentiate between what is real and what is fake. On the other hand, false information may be used as a tool in the public opinion game played between countries, making the international public opinion environment more complicated.

3. Solutions

ChatGPT presents several challenges for communication scholars and raises communication-related issues. To address these, scholars must assess the real impact of ChatGPT and guide people in understanding and optimizing the technology. This will ensure that ChatGPT achieves its ultimate goal: creating a better communication environment for humans.

3.1. Emphasize and Carry out Relevant Work against False Information

ChatGPT has a preliminary moral judgment ability and can use the ethical values it learns to verify whether the user's questions are legal, compliant, or in accordance with moral and ethical rules. The acceleration of technology leads to the upgrading of technology and the continuous improvement of technology ethics itself. Further, R&D teams and the media industry should actively respond to the challenge brought by ChatGPT, attach importance to it, and carry out relevant work against false information to form a more diversified and intelligent ecology.

R&D teams should strengthen anti-counterfeiting technology. For companies like OpenAI, it is important to introduce chatbots to the public in a controlled and responsible

manner. On 31 January 2023, the OpenAI website announced that they had trained a new classifier to distinguish between text written by humans and content generated by AI, which is now publicly available for use. These works are only a small part of what is needed if we want AI to develop in a standardized and legal way. More technical support and investment are needed:

- 1. A library for identifying illegal and harmful information should be established to audit input content and production results.
- 2. With powerful data search and identification capabilities, ChatGPT can deduce the credibility of the message by analyzing the propagation path, and then judge the authenticity of the message.
- 3. When facing content that combines text with audio, video, and other modes, multimodal alignment can be used for authentication.

For the media industry, the emergence of ChatGPT reflects the hybridity and complexity of the information system that humans face today. Media practitioners should conduct training on media literacy for citizens to enhance their awareness of information authenticity and their ability to distinguish between media of different quality. Moreover, the emergence of ChatGPT has raised the demand for users to understand and adapt to algorithms. Understanding the natural language processing principles behind ChatGPT is beneficial for citizens and allows them to explore the boundaries and scenarios of the affordances of technology and algorithms.

3.2. Achieve Full-Process Coverage of News Events and Improve the Quality and Efficiency of News Reporting

ChatGPT interacts in a conversational way. The dialogue format makes it possible for ChatGPT to answer follow-up questions, admit its mistakes, challenge incorrect premises, and reject inappropriate requests [5].

Based on the above, ChatGPT can be applied in news reporting. For one thing, it can provide information through interactive Q&A, help journalists quickly collect and organize materials, and assist in news writing. For another, ChatGPT can learn the style of news and quickly find the appropriate writing approach.

However, ChatGPT cannot achieve independent thinking and cannot produce creative viewpoints. In news writing, besides pursuing facts, caring for humanity, understanding society, and outputting insights are required. These require psychological and intelligent construction from humans to explore, rather than relying solely on intelligence.

Therefore, enabling ChatGPT to achieve full-process coverage of news events and generate more coherent, natural, and human-like text can start from the following aspects:

- 1. Use Dramatron to prompt. Dramatron uses technology such as a long-term dependency model, a pre-trained model, context control, and style control, which can be combined with ChatGPT to help the model better understand the language structure and context, resulting in full-process coverage of news events.
- 2. In essence, ChatGPT is still a set of computational formulas and mathematical models [6]. It does not possess the personality of a human formed in the course of social and historical development, nor does it have a human body. When answering questions, ChatGPT often says "I am", but this "I" is only the "I" of its corpus, and ChatGPT does not have a complete sense of "self". Having a humanoid psychological and intelligent construction is an important part of achieving a strong sense of self. For example, introducing an Attention Mechanism can make ChatGPT ignore or deepen certain memory content and generate more coherent, natural, and human-like text.

3.3. How Media Professionals Can Utilize Their Irreplaceability with the Advent of AIGC

Alongside the emergence of generative AI comes a widespread concern in various industries about whether AI will replace human workers, and the media industry is no exception. Discussing the potential advantages and unique value of being human holds distinct philosophical and practical significance.

To better understand the unique advantages of media workers compared to AI, we need to examine them from a humanistic perspective. On one hand, human nature is irrational, and people naturally desire to be understood and noticed. This requires media workers to have the ability to write and investigate with a humanistic, caring perspective. On the other hand, humans are social animals, and the transmission of social knowledge and experience is particularly important in the process of individual socialization. Media workers can make this knowledge and experience transmission a unique aspect of their own content.

Technology is an important factor driving concept construction and cultural advancement. Therefore, media workers can combine AI technology with their daily work to improve their work efficiency while investing more time and energy into more valuable creation, which can promote the realization of the unique cultural values of mankind. With the wave of AIGC passing over society, media workers should let artificial intelligence enhance human expression and creativity, so that the light of technology can refract the radiance of humanity itself.

Author Contributions: Opportunities, Y.X.; Problems, B.W.; Solutions, Y.X. and B.W.; Instruct and polish, Q.W. All authors have read and agreed to the published version of the manuscript.

Funding: This research received no external funding.

Institutional Review Board Statement: Not applicable.

Informed Consent Statement: Not applicable. **Data Availability Statement:** Not applicable.

Conflicts of Interest: The authors declare no conflict of interest.

References

- 1. Wang, L. Possibilities and Changes: In-depth Study on the Information Turn of Philosophy. *J. Northeast. Univ. (Soc. Sci.)* **2016**, *18*, 557–563.
- 2. Zhang, H.; Zhang, E.; Di, X.; WANG, Q. The Construction and Considerations of Human-ChatGPT Relationship from the Perspective of Parasocial Interaction. *Soc. Gov. Rev.* **2023**, *1*, 20–29. [CrossRef]
- 3. Ling, X.-X.; Wang, D.-M.; Yuan, J. Reflection on Technology Ethics and Academic Ethics in the Context of ChatGPT Craze. *J. Xinjiang Norm. Univ. (Philos. Soc. Sci.)* **2023**, *44*, 123–136.
- 4. Chen, Y. Beyond ChatGPT: Opportunities, Risks and Challenges of Generative AI. *J. Shandong Univ. (Philos. Soc. Sci.)* **2023**, *3*, 127–143. [CrossRef]
- 5. Introducing ChatGPT. Available online: https://openai.com/blog/chatgpt (accessed on 25 April 2023).
- 6. Lund, B.D.; Wang, T. Chatting about ChatGPT: How may AI and GPT impact academia and libraries? *Libr. Hi Tech News* **2023**, *40*, 26–29. [CrossRef]

Disclaimer/Publisher's Note: The statements, opinions and data contained in all publications are solely those of the individual author(s) and contributor(s) and not of MDPI and/or the editor(s). MDPI and/or the editor(s) disclaim responsibility for any injury to people or property resulting from any ideas, methods, instructions or products referred to in the content.