Data Privacy Intelligence and AI Ethical Obligation

Fangji Chen

Georgian College

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Katie Tiwari

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Instruction

AI is one of the trendiest technologies in the world. This superstar technology is supporting companies to deliver advertisements, assisting you to go shopping online, even helping researchers to select drug candidates. Why AI developed so fast in recent years? I think there are five main advantages:

- 1. Problems will be tackled in a more efficient and accurate way with AI solutions.
- Tremendous data are being transported in a faster speed and in a shorter time thanks to modern network technologies.
- 3. With the popularization of new platforms and technologies, tremendous data could be stored, transformed, reloaded, and analyzed in a more affordable way.
- 4. Major technical breakthrough of AI requires large scales of computing resources which has become more affordable in recent years.
- 5. AI applications can help businesses make more money. It helps businesses survive in the escalating commercial competitions.

The expanding requirement for information interchange is the cornerstone of creating an AI, among all the other elements outlined above. Without highly efficient information exchange and the powerful integrated tools for tremendous data management, AI is little more than castles in the air.

But in the past, since there is neither a cheap way to store massive business data nor an easy way to analysis them, tremendous data storage had been treated as troublesome deadweight for most of companies in the past. Until google opened its GFS file system, big data became business gold mine. Based on the development of mobile devices, whomever collects personality

data with the finest quality through mobile devices would gain the best chance to provide personal service and win the most customers by earning their loyalty. And after decades of efforts of those high-tech AI companies, AI becomes a significant power to connect human needs and the real world. AI formally advanced into people's daily lives.

Thesis statement

However, despite the benefits AI might provide, its ethical responsibility is ignored for a long period of time. As an Algorithm Engineer working in the relevant research field, I use to directly confront similar challenges. My responsibility is to identify fraud advertisement clicks and prevent our advertising platform from real-time fraudulent data streams. To best improve my fraud detection performance, I require enormous amounts of valuable data: the more valuable data we collect, the higher accuracy we can promise to our processing result. Apparently, the most valuable data include potentially the most sensitive information of our customers. And businesses will always try their best to request for the most profitable data so long as it is not illegal.

People have benefited much from the big data era in the past two decades are all thankful for the changes AI has brought into their lives. However, it now seems their optimism was premature. The degree of risk associated with their business expansions was seriously underestimated by the people who benefited from them. The initial euphoria over the exhilarating development of AI has been replaced by a more sober assessment of reality. People started to know about not only the benefits but also the issues and challenges posed by AI.

As reported from China, some high-tech giant companies are disregarding their moral duty, abusing users' data to build their extra profitability. Didi, a high-tech giant provided ride-hailing services, fined over 8 billion Yuan because of the offences on trying to differentiate the

price based on how rich the users are with their big data technologies. (Ma & Cao, 2022). Meituan, a food delivery giant, fined 534 million Yuan for abusing their big data technologies to make price discrimination. (Wang, 2021). These recent news reports reveal some typical AI issues and challenges. And there would be more.

Because new policies could not keep up with the shift AI bring into people's daily life, corporations that controls AI became the last defense between AI and humankind. And if AI will be keeping developed without obeying the moral principles, it will become a personal power only serving its owner, take great trouble to people who use it, and lead to cognitive biases, discriminations, unauthorized surveillances, trust deficit, and social division to human society. All these ethical challenges are becoming significant and unavoidable followed by the development of AI. As a good sign, people are now more conscious of the risks and pitfalls of AI than just its success, because more examples reveal that how biased algorithms have created problems and challenges in the corporate sector, the government, and everyday life. Why people suffer such discriminations from AI after the brand got the loyalty from their users? This paper will address this issue and propose solutions in three facets.

Body paragraph 1: public scrutiny and people's lack of vigilance

The understanding of the hazards that both individuals and society are facing is the hardest part of addressing the issues and challenges posed by AI. Most people's understanding of AI still relies on media depictions and the knowledge of history. Modern AI is different from the traditional definition that AI is human like and all-powerful. It based on knowledge, which is in the form of the computer data, to make decisions as a specialist in particular knowledge fields. As a result, AI needs a lot of data to thrive. We are highly expecting for the changes AI would bring into people's lives in one hand and seriously underestimated AI's strong demands to

people's personal information. This lack of foresight is one of the very reasons why we lose control of our privacy. People therefore confronted with various problems like discriminations, surveillances, etc. Users of the ride-hailing services might face price discrimination. People who reveal their real-time whereabouts may be under surveillance. When people are browsing on the internet, their online surfing interests and hobbies will be kept tracking by corporations, and their valuable privacy may be sold. As long as a person is online, AI will be keeping an eye on them. (Xie, 2018).

Despite all these issues and challenges, people should think carefully about whether it is morally and legally acceptable to use a novel service provided by AI instead of dreading this or, worse, have defended against it. Thinking carefully and cautiously and provide AI only the basic access rights to our devices, or, even if more expensive, we should look for other services that are more morally and legally acceptable.

Body paragraph 2: Technic Obligation and CSR

Other than the customers who use AI, corporate influence is also a crucial component to this problem. As long as the data scale grows, the AI service will become more and more clever. And clever AI will win customer loyalty and help the company survive the business competition. For this reason, Internet giants are keen to collect as much data from their users as they can, especially personal data.

It is obvious that personal data are sensitive. But when people give AI permission to access their privacy, there is no practical way for individual clients to limit how businesses utilize its personal data. It only depends on how reliable the corporation is. According to Ahmad and Janczewski, "The challenge of big data is not only caused by people's lack of vigilance, but also caused by organizational culture and environmental influences." (2016). The technic reason

of big data challenges is that data generated so fast for us to follow up with it. This creates difficulties in maintaining data protection and complex using of it in the future. Besides, implementation of protection required for a big data environment can be an expensive and challenging task. Developing new technologies to prevent privacy leaking and abuse is one of the top challenges for business who manage big data. The cultural reason of big data challenges is that the risks associated with disclosing our personal information are not treated seriously by service suppliers. The business and its employees should assume responsibility for safeguarding their reputation and the faith their clients have in them. As an appropriate example of how well the government knew people's private information, Xie cited the US government's management of the surveillance programme PRISM which was heavily backed by major global high-tech companies. (2018). Follow the moral principles and make sure not to break it just for making money, because killing the goose that lays the golden eggs will not keep the business last long.

Body paragraph 3: Legal Restraint

Unfortunately, companies are always considering their profitability first rather than their responsibility. With the sudden arrival of AI, many existing rules and regulations were collapsed where new policies could not keep up with the change. And without obeying the moral principles, AI will become a power out of control. "If data can move to these unregulated areas, users' information will be invaded without restrictions." (Xie, 2018). Out-of-control developing of AI will not be the assistants of people and society, but the terminator against humanity.

But if the laws strictly protected personal big data privacy, big data initiatives and its corresponding business models will be seriously hindered. It is no doubt a dilemma. According to Xie, this is the most important part to let the big data technologies under control: sensitive data must be clearly defined, the process of personal data collection must be standardized (Xie, 2018).

Privacy challenges does not only a issue of developed countries and area. Privacy is a fundamental right of everyone. No matter whoever you are, wherever you live, you would be hurt by un-ethical AI soon or later. And the evil AI will always thrive without restriction in somewhere. Therefore, it is a necessary initiative to build a worldwide consensus of the ethical principles of AI if we don't want to be continually under long-time threaten by the massive data we produce. Because the technology development of AI and the progress of data protection legislation in different areas are not always at the same level, governments need to strengthen cooperation and negotiation with others to promote regulations (Xie, 2018).

Conclusion

As a conclusion, AI brings advantages and convenience, but it also brings challenges and risks to people who enjoys the benefits AI brings to us. People are suffering unfair treatments like AI discrimination if they don't have rights to their privacy. We should clearly be aware of that the big data technologies will become a tool only serve the companies and governments not the users and customers if we only care about the service the company provides. (Hervais, 2015). Only the unity of individual awareness, corporate social responsibility, and the legislation will save the future of humanity from immoral artificial intelligence and the evils who own it.

Annotated Bibliography

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South China Morning Post. https://www.scmp.com/tech/big-tech/article/3123425/how-chinas-internet-giants-have-failed-countrys-youth

This article is about social responsibility of Chinese tech giants. After years of freewheeling development, the high-tech businesses felt that their progression have stalled. To survive business competition, the pursuit of sustained growth at all costs becomes a new kind of work value for most of tech giants of China. The 996 work schedule – 9am to 9pm, six days a week – became a popular solution for companies to reclaim the chance to survive. But real technological advancement starts by addressing people's needs instead of suppressing them. Tech companies should take up the responsibility of building a more humane workplace. It is not too much to ask for a healthier work culture for Chinese tech workers. The bright future of China's tech sector can only be sustained by energised, fulfilled and dignified people.

Drucker, P. F. (1999, October). Beyond the information revolution. The Atlantic.

https://www.theatlantic.com/magazine/archive/1999/10/beyond-the-information-revolution/304658/

This long article shows a brief introduction and displays a historical horizon to the information evolution in the last century. First, the article introduced the first and the second industry revolution. How people's life changed in a long period of time during those significant inventions and creations came into people's life. Then similar things happened in this information revolution. Information technology revolution change not only how customers buy but also what they buy. It changes consumer behavior, savings

patterns, industry structure—in short, the entire economy. With these major new technologies came major new social institutions. In the near future, people will see the emergence of a number of new industries. And by the experience we learnt from history, few of them will come out of information technology, the computer, data processing, or the Internet. This will deeply infect the international relations. What we call the Information Revolution is actually a Knowledge Revolution. This means that the key to maintaining leadership in the economy and the technology that are about to emerge is likely to be the social position of knowledge professionals and social acceptance of their values. Bribing knowledge workers to be content to remain employees by giving them bonuses and stock options is not working in the future. If it can work at all, can work only as long as the emerging industries enjoy a stock-market boom, as the Internet companies have been doing. The next major industries are likely to behave far more like traditional industries—that is, to grow slowly, painfully, laboriously. Just like what Chinese hightech companies are experiencing recently. For them to remain traditional "employees" and be treated as such would be tantamount to England's treating its technologists as tradesmen—and likely to have similar consequences: losing its predominance and beginning to be overtaken by the others.

Fhom, H. S. (2015). Big Data: Opportunities and privacy challenges. *arXiv preprint* arXiv:1502.00823. https://doi.org/10.48550/arXiv.1502.00823

The coming era of AI and big data has advantages and makes life easier, but it also presents risks and challenges to those who benefit from it. This essay provides a brief overview of the moral dilemma posed by misuse of data privacy. The first part of this survey discussed the benefits of using big data, which includes business optimizations,

customer analytics, data-Intensive science, medicine and healthcare, financial services, modern energy infrastructures, openness and efficiency in government and so on. The second part states that the ethical challenge is un-negligible because of surveillance and discrimination, lack of Transparency, breach or abuse of data privacy and the data protection laws' omission. As a conclusion after reading this paper, I think people will under surveillance if they don't have rights to their personal data, and the big data technics will become a tool better serve the companies and governments than the users if we care only about the service they provide.

Heyward, C. (2020, Nov 18). The growing importance of social responsibility in business.

Forbes. https://www.forbes.com/sites/forbesbusinesscouncil/2020/11/18/the-growing-importance-of-social-responsibility-in-business/?sh=4a741c072283

Although corporate social responsibility is not compulsory, there are several reasons it is important for companies to prioritize social responsibility: it can help you attract and retain employees, it shows a sign of accountability to investors, CSR saves money in a long-term operation, CSR can enable you to better engage with customers.

Livingston, M. (2020, Dec 28). The holy grail of enterprise AI: shifting to a people, profit and planet focus. Forbes. https://www.forbes.com/sites/forbestechcouncil/2021/12/28/the-holy-grail-of-enterprise-ai-shifting-to-a-people-profit-and-planet-focus/?sh=512f7aae5808

The core concept is that ethical AI will be the cornerstone of efficient operations in the future. Understanding the inherent biases that exist in Artificial Intelligence will help organizations outperform their peer groups and create differentiation in a rapidly growing market. Having both cultural and gender diversity is key to having an AI landscape that

can deliver ethical models without inherent bias. The holy grail for any AI corporation is a seamless network of partners, suppliers and customers who talk to each other in real-time, intelligently and at the speed of data. Through the deployment of ethical AI, is not only good for the future of business but for our society at large.

Ma, S., & Cao, Y. (2022, July 21). *Ride-hailing giant didi fined over 8 billion yuan*. China Daily.

https://global.chinadaily.com.cn/a/202207/21/WS62d95801a310fd2b29e6db39.html
This is a news report about one of the top internet high-tech companies Didi. China is applying stricter regulation of data security on data breaches. Instead of just paying lip service, companies must devote large resources to beef up the protection of data and personal information. therefore, take responsibility to society is as important as earn money using new technologies. This case forced Chinese high-tech companies to seriously think about what is really important for the healthy development of companies.

Salleh, K. A., & Janczewski, L. (2016). Technological, organizational and environmental security and privacy issues of big data: A literature review. *Procedia computer science*, 100, 19-28. https://doi.org/10.1016/j.procs.2016.09.119

The challenge of data privacy is not only caused by people's lack of vigilance, but also caused by organizational culture and environmental influences. The technic reason of big data challenges is that data generated so fast for us to follow up with it. This creates difficulties in maintaining data protection and complex using of it in the future. Besides, implementation of protection required for a big data environment can be an expensive and challenging task. If the laws strictly protected personal big data privacy, big data initiatives and its corresponding business models will be seriously hindered but companies are always considering their profitability first not their responsibility. As a

conclusion after reading this paper, I think legislation is still the most important way to fix this or we will continually under long-time threaten by the massive data we produce.

Vadapalli, P. (2022, October 3). Top 7 challenges in artificial intelligence in 2022. UpGrad.

https://www.upgrad.com/blog/top-challenges-in-artificial-intelligence/

The impact of AI on human lives and the economy can add about \$15.7 trillion to the world economy by 2030. This article introduces 7 main challenges of AI nowadays: restrictions of computing power limits the thrive of AI, trust deficit and potential ulterior motives of creating an AI, people's naive awareness of the potential of AI, perform a human like performance in general works, data privacy and security, bias and data scarcity. One of the biggest artificial intelligence problems is that the sophisticated and expensive processing resources needed are unavailable to the majority of businesses. Additionally, they lack access to the expensive and scarce AI expertise required to utilize those resources effectively. There are three ways to overcome the above-mentioned problems: utilize the already existing AI technologies, keep updating AI technologies regularly, and take advantage of the latest technology.

Wang, Y. (2021, October 8). Food delivery giant meituan fined \$534 million for violating antitrust law. Forbes. https://www.forbes.com/sites/ywang/2021/10/08/food-delivery-giant-meituan-fined-534-million-for-violating-antitrust-law/?sh=5feb01254d97
The State Administration for Market Regulation levied the fine, which equates to 3% of the food delivery giant Meituan's domestic revenue for 2020 because it forced its customer to choose their service or prepared to be kicked out. This business practice violate antitrust practices. Therefore, Meituan 3.44 billion yuan (\$534 million)

Xie, L. (2018, May). Who Moved My data? Information Privacy Concerns In the Big Data Era.
In 4th International Symposium on Social Science (ISSS 2018) (pp. 299-303). Atlantis
Press. https://doi.org/10.2991/isss-18.2018.61

This paper started with a case study – PRISM. Readers can get information as follow: government knows our personal private information; these data are provided by internet giants; and we had been well known by the Internet; if the government gain the ability to monitor and analyze people, so are those giant companies. And unluckily, we can neither stop the government after data exposed nor those companies in most of cases. The reasons why these risks appears are as follow: first, People leak information in traditional ways before big data era, but nowadays, the way to get private information are of greater diversity; second, people will be monitored by devices and public services as long as they are connected to the internet; third, big data analysis are more powerful only if it observes tremendous data, which comes true in recent years. So, after these, is the risks could be prevented? Do we have methods of protecting data privacy in big data era? As a conclusion after reading this paper, I think there are three key measures to solve this problem: improving technical methods to protect data privacy as technology measure; pushing governments to take the responsibility to protect public's information privacy by enacting regulations as legislation measure; training Individuals to improve privacy awareness and take measures to protect their sensitive information as Individuals measure.

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