

THE IMPACT OF ARTIFICIAL INTELLIGENCE ON JOBS

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Abstract: *The influence of artificial intelligence on the labor market is extremely great these days. In this article we will try to understand whether neural networks are able to replace full-fledged workers in various spheres. We touched upon the problem of artists, because the databases of neural networks are based on the works of real artists, and it can be considered plagiarism. We also discussed how programmers can use neural networks to write code more easily. And in the last paragraph we found out what disadvantages artificial intelligence has and how this prevents it from fully replacing workers in various fields.*

Key words: *Artificial Intelligence, jobs, impact, future, mankind.*

Introduction

Artificial Intelligence is in the vanguard of innovation in the nascent digital era, offering previously unheard-of breakthroughs and efficiencies. However, as AI permeates every aspect of our life, worries about how jobs will be created in the future also surface. This piece delves into the intricacies of AI's effects on the labor market, analysing concerns about employment displacement in light of emerging prospects. We explore the core of the disagreement: Does AI encourage human creativity and teamwork or is it a sign of impending job shortages? We encourage readers to think about who might need to adapt as we map out the growth of AI and how it can be a potent ally in the workplace. Join us as we explore the intricacies of artificial intelligence and employment, looking for a fair-minded viewpoint that demystifies AI and highlights its potential to improve the state of our profession.

Artists are losing their jobs

The threat from neural networks is felt by people of all kinds of professions. Everyone is afraid of losing their piece of bread in this world. Artists have felt it especially keenly. Not so long ago, one of the most popular marketplaces "ArtStation" went on strike [1]. Artists demanded that the works of artificial intelligence be labeled with the appropriate sign, because it discriminates against them and unethically takes away their income. And, in general, if you look at the works of artificial intelligence "Midjourney" and the average artist with "ArtStation" they are not very different, the only difference is that a person spent a dozen hours and years of practice on his creation, where the neural network generated an image literally in one minute [2]. And there are a lot of analogs of "Midjourney" today, and they appeared not yesterday, just until recently their works were very funny, well, or just "conceptual", in general nothing serious that could infringe on the profession of the artist. But all this time neural networks have been learning and are still learning. By uploading our photos to TikTok to get its anime version, we improve the Chinese neural network with our data. Neural networks are getting mass attention today, not only for the quality of their work, but also for the speed at which they execute it. What a painter would take about a week to complete (and maybe the deadline would be overdue, or your tastes would not match), a neural network does in a minute, even offering several options to choose from. But nevertheless, at this point in time, the neural network is not yet capable of producing a fully-fledged finished product, the result of the neural network still needs to be finalised, which requires a specialist (artist). By the example of the neural network "Midjourney", we can see that artificial intelligence offers us several pictures to choose from. It gives us a choice, because the neural

network itself does not understand what is "beautiful", it does not understand what is right and what is wrong, so it may have problems with the proportions of the image, small details. All these defects will have to be corrected by a real artist. Essentially, we get a semifinished product, which may satisfy the needs of low-budget projects, but if the customer needs a specific result, it will be very difficult for neural network to do it, because the main problem of artificial intelligence is that it relies on the database, that is, on what has already been done once. Unlike humans, it is not yet capable of creating something fundamentally new.

How employees from it use Ai for their works

Nowadays, as we all know Ai has been in all programmer's life since it's a very useful tool that helps them develop more skills and win more time and make their work look much perfect [3].

First and foremost, automated testing tools powered by AI streamline the testing process, while intelligent code completion and refactoring tools enhance productivity and code quality. Moreover, Ai algorithms can assist in refactoring code by identifying redundant or poorly structured code segments and suggesting improvements. As a result, this helps in maintaining code maintainability and readability. Furthermore, Ai tools can analyse codes and automatically generate documentation, including comments, function descriptions, and usage examples which simplifies the documentation process and ensures codes remain well-documented. Also, Ai tools can assist programmers in generating code snippets or even entire modules based on requirements or patterns learned from existing codes which helps in speeding up development processes and reducing human error. Finally, AI-powered tools can help programmers identify bugs in code by analysing patterns of errors, which aids in debugging and maintaining code quality. Apart from programmers, artificial intelligence is widely used by CEOs and managers of organisations to track the progress of a project [4]. Artificial intelligence helps to evaluate the efficiency of workers and set competent goals for the project. However, not all employees agree to be monitored and collected by artificial intelligence.

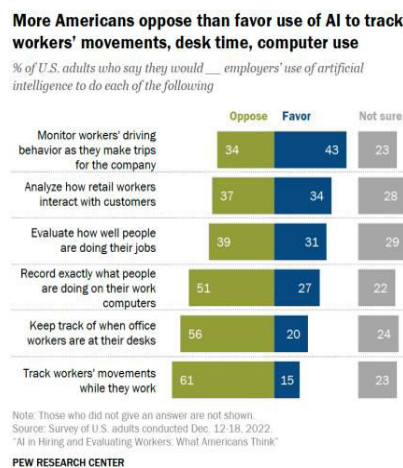


Figure 1.1 – Research [5]

Privacy concerns and the anxiety of being continuously watched are frequently the root causes of this worry. Workers can believe that monitoring powered by AI violates their privacy and erodes their sense of independence. Furthermore, there is concern that AI might be used to make hiring decisions without taking into account the unique circumstances of each applicant. It is imperative for enterprises to create unambiguous policies on the application of AI and to maintain employee transparency regarding the nature and extent of data collection. Incorporating staff members into the discussion on AI implementation can also help allay concerns and promote a culture of trust. The secret to effectively integrating AI in the workplace is ultimately striking a balance between protecting employee privacy and using AI to increase efficiency.

Neural network deficiencies

One of the most debated questions today is whether neural networks will be able to put someone out of work. It should be noted that neural networks have a number of drawbacks, and the first is ethical. An AI system designed to maximise a specific goal, such as profit, or employee efficiency, can make decisions that will directly harm people, all in the name of achieving a specific goal. There are already concrete examples in the world - Amazon, where the work of warehouse employees has long been regulated by a neural network [6]. And it caused a lot of scandals, because the neural network set tasks that humans are not able to fulfil. Amazon certainly has a fantastic service, but it is achieved at the expense of humiliating employees. In case of an emergency in the same amazon warehouse, or elsewhere, the question arises: "And who is to blame?". And that's the next problem-lack of accountability. Even advanced systems can make mistakes, but who is responsible for them? A neural network is capable of making decisions without human intervention, but it is not capable of taking responsibility for the consequences. The autopilot of a Tesla that violates traffic rules cannot be ticketed [7]. The programmer who wrote the neural network is also not to blame, because it is the independent decision-making that distinguishes a neural network from an ordinary bot. Another problem is the bias of the neural network. A neural network system is only as good as its data. This can lead to biased and unfair consequences. The closest example is the artificial intelligence used by a bank to issue loans. Such an AI is not able to make exceptions, unlike a real employee, who would be able to make an exception based on a live conversation, having seen the face and facial expressions of a client. As a result, the neural network deprives the bank of the client and the client of money. Nevertheless, people do not suffer from the system's error in the work of banks, unlike courts, where people's fates are decided. This error can be very costly for an innocent defendant. Suppose if a neural network relies on statistics in an American court against a dark-skinned guy who is really innocent. Fortunately, this is just speculation for now, but what's happening already today is that neural networks are really automating industries and taking jobs away from humans. Tech support workers, for example. A living person is not capable of being online 24/7 unlike a neural network, which does not take up a physical workplace and is cheaper.

Conclusions

In summary, the advent of artificial intelligence heralds a nuanced paradigm shift fraught with both promise and peril across diverse professional spheres, notably impacting practitioners in artistic fields alongside workers in logistical and technical support domains. While the efficacy and swiftness of AI systems are undeniable, their deployment raises profound ethical quandaries, including inherent biases, a dearth of accountability structures, and the potential for deleterious repercussions on human labor. It is incumbent upon society to proactively confront these challenges, instituting robust frameworks for the responsible development and utilisation of AI technologies aimed at advancing societal welfare while mitigating adverse outcomes. In navigating this dynamic terrain, fostering symbiotic relationships between human actors and AI entities, underpinned by judicious regulatory oversight and ethical imperatives, emerges as imperative. Through concerted efforts, a future wherein technology serves to complement rather than supplant human creativity, ingenuity, and empathy can be envisaged and cultivated.

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