Journal of Arts and Social Sciences
https://ojs.jass.pk

The Competition Myth: Exploring the Symbiosis between Human and Artificial Intelligence

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ARTICLE INFO

Article history:
Submitted 13.07.2024
Accepted 24.10.2024
Published 31.12.2024

Volume No. 11
Issue No. II
ISSN (Online) 2414-8512
ISSN (Print) 2311-293X
DOI:

Keywords: Human-Artificial Intelligence, Symbiosis, Hybrid Intelligence, Analytical Capabilities, Augmenting Human Potential.

ABSTRACT

The generally conceived belief that jobs are at danger of being replaced by AI has sparked concern which resulted in human intelligence being seen as in conflict with AI systems. However, this perceived rivalry obscures a more profound reality: the integration between human beings and artificial intelligence. For that reason, this study refutes the competition myth and shows that people and AI can work together. Human intelligence is superior in adaptability, feelings and the ability to consider the circumstances, whereas AI is faster, flexible at scale, and analytical. Combinatorial of these capacities gives rise to hybrid intelligence, which essentially extends human capabilities and reconstructs problem-solving approaches. As demonstrated in this study, AI can serve to enhance human capabilities that are more valuable, work on the tasks that are best executed by human intelligence, and can create path to a new paradigm of human-AI collaboration.

Introduction

In the context of defining intelligence, as the ability to generate a set of diverse capabilities to solve specific problems, intelligence has become a human-technology symbiosis. It is the use of general mental capacity to reason, understand, resolve and learn numerous situations unifying with several cognitive purposes like language, observation, planning, storage and perceptiveness including simple to complex analytical inquiry which is obtained or learnt.

Intelligence that has lately been remarkably influencing the world is the Artificial Intelligence (AI). This exceptional intelligence has the ability to emulate human intelligence carrying out divergent tasks, that need thinking, learning, finding solutions to problems and making decisions. It is one of the foremost discussed concerns of today, but there appears very little understanding about the differences and similarities between machine and human intelligence. AI is in fact the program or a software that is put into machines, various computer related devices and other interconnected systems that supplies them with thinking ability. Much of the present-day artificial intelligence techniques are still under discussion as more study is needed on the way how it is evolving in giving solutions to the problems, like carrying out of the projects without any inaccuracy and execution of different tasks without any sort of human command or help.

Manufacturing of self-driven cars to large language models like GPTs, manifests that artificial intelligence is swiftly moving forward. AI automation has a long history which is diligently and continuously changing over time, while concerning on sharp agents that contain tools which become aware of environment and focus on the action for the sake of maximizing goal's success prospects. It is the attribute of machines, solutions and systems that brings about an intellectual and innovational role of a person's singularity, finds ways to solve problems and is capable of taking decisions and drawing conclusions. In

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Singularity is near (2005) Ray Kurzweil discusses the merging of human and artificial intelligence as technology approaches singularity. The latest researches on AI devices, include deep learning, machine learning, predictive investigation and is calculated towards expounding and increasing the learning, reasoning, planning, thinking and action taking capability.

Problem Statement

Despite the growing consensus on the transformatory potential of Artificial Intelligence (AI), the prevailing narrative puts human intelligence against AI, fostering an atmosphere of competition and anxiety. This perceived rivalry obscures the harmonious strengths of human and artificial intelligence, hindering the realization of their synergistic potential. The misconception that AI will displace human workers, diminish human agency, and exacerbate social inequalities has significant implications, including inefficient utilization of AI capabilities. It results in missed opportunities for augmenting human potential, increased anxiety and resistance to AI adoption and insufficient investment in human-AI collaboration. Considering all of it, this article will explore how and in what ways AI seems to be profound than human intelligence and why AI until now hasn't reached human level in particular situations along with unfolding its existing confrontation with human intelligence. This study will highlight the possibilities for symbiotic alliance between humans and AI, leveraging their complementary strengths to drive innovation and productivity.

Objectives of the Study

The objectives of this study are such as:

(1) To challenge the competition myth and promote a collaborative paradigm.
(2) To investigate the supportive powers of human and artificial intelligence.
(3) To explore the advantages and challenges of human-AI symbiosis in several areas.
(4) To develop strategies for fostering effective human-AI collaboration and augmenting human potential.

Review of Literature

The promising development of Artificial Intelligence (AI) has generated tremendous controversy concerning its capability to enhance human lives. While some predict that AI will displace human workers, others envision a harmonious collaboration between humans and machines. This ongoing attention in the direction of drawing the AI in robots for evolving the human like properties to a great deal adds on the human dependency on technology. AI is primarily considered as the artificial depiction of human brain that tries to replicate its learning procedure with the objective of copying its strength. Computer has undoubtedly the capacity to execute in a well-organized manner that enhances the ability of AI which alludes to the potentialities of computer that are identical to human beings, like acquiring knowledge, having faculty to discern, foresee and establish the meaning of specific settings. This mechanization is mainly moving the present life and has achieved admiration in various sectors like schools, industries, hospitals, military, music, gaming and many more. It is basically the ability of machines to decide and determine. AI implies smart machines that exercise a substantial amount of data that human beings cannot bring off. It is setup for specified purposes like learning, depicting and comprehending, while on the contrary, human intelligence is interested in various capabilities of multitasking. *The Fourth Age: Smart Robots, Conscious Computers, and the Future of Humanity* (2018) by Byron Reese explores AI's broader implications on human roles, touching on themes of competition and augmentation.

Research on human and AI integration stems from multiple fields, cognitive science (Kurzweil, 2005), social theory (Brynjolfsson & McAfee, 2017), and human computer interaction. These studies show that people and AI can be stronger together, thus preparing the ground for coexistence. There is plenty of research proof that humans are better at creativity (West, 2018), empathy (Goleman, 2005), and at the ability to understand context (Lake et al., 2017), while AI is superior at speed of processing (Davenport & Dyché, 2013), analytical abilities (Jordan & Mitchell, 2015), and values data-driven decision-making (Hastie et al., 2001). Recent studies have also shown that human and AI synergy works well in numerous applications, such as diagnostics (Esteva et al., 2017), healthcare especially in the factors of treatment plans, in adaptive learning, in intelligent tutoring, and for managing and predicting risks (Davenport & Dyché, 2013).

However, like any collaboration, human-AI working together also comes with some difficulties. In particular, machine decision-making inheritability can raise problems of bias and fairness (Barocas et al., 2023), questioning of human agency and accountability in such a symbiosis (Tegmark, 2017) and last but not least the matter of job displacement and social inequality (Brynjolfsson & McAfee, 2017). AI is gradually set to modern competencies, by training automatically and by the instructions to perform. This quantum leap can scare human race in the future in a manner that machines will not be able to convey the emotions productively. There may be a likelihood in future that AI can help human beings with the duty and affection which generally do not call for the feelings and emotions. It is also considered that if AI grows with the same

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rate as it is growing now a days, it may give rise to warning for humanity because its autodidactic ability may bring about the AI instrument to learn ruinous things. In *Homo Deus* (2017) Yuval Noah Harari discusses the same idea and examines what might have happened to the world when old myths are coupled with new superhuman technologies such as AI and genetic engineering. Russell Stuart (2019) thinks that machines would be capable of thinking in a less-stronger manner. According to him, the dearth of emotion in the machine may lead the way to disastrous situation as machines can literally think but cannot have the feeling of conformity and do not know how to discern between various viewpoints of humans.

Russell and Norvig (1995) are of the opinion that the role of AI machine is more positive and it would be impractical to consider its influence conflictingly. Humans normally use a rapid and instinctive judgement rather than moderate withdrawal modelled by AI. Discovering more productive algorithms to resolve this issue is the foremost concern. The search for neurologic network endeavors to copy the formation in the brain that leads to this expertise. Ability of taking measures is built on deep thinking and emotions in human beings, in contrast to AI which only takes steps subjected on their coding. Therefore, the absence of emotions and contrast with regard to good or bad adds up to the threats. As AI has become talented, the evolution of new algorithms will keep on helping it to a great deal with devices to learn and to put idea into writing, making it capable to acknowledge and draw straightforward visible concepts. In general, the chief virtue of human beings is their pace and diversification with regard to the new ideas and putting them into new settings, whereas computers normally have difficult time hypothesizing from specific specimens.

Significance of the Study

This research aims to redefine the human-AI relationship, unlocking new possibilities for innovation, productivity, and social progress. By addressing the competition myth, we can enhance human-AI collaboration, foster a more inclusive and equitable AI-driven future and promote strategic investment in human-AI research and development.

Discussion

Currently, AI is growing deeper and deeper into our everyday lives. The application of AI in business puts up to the possibilities of several positions of routine life like after-sale services, client help, sales and marketing, management, finance, commerce and technical procedures in numerous sectors. The acquisition of technology like AI will help rank companies to be one highly efficient and sustainable. It is primary to think that AI has not come about to replace human beings but to endorse them. It has made it easier for us to navigate in nearly every sphere of life and still has huge room in time to come for added efficiency and improvement. It assists in research, data analysis and decision making by augmenting human intelligence and manages repetitive and mundane tasks, freeing humans from creative work. AI based adaptive learning systems personalize education. If we talk about healthcare, AI aids diagnosis, treatment planning and patient care. The powered tools by AI streamline workflow and optimize process-collaboration with human in art, music and writing. It improves accessibility by helping people with disabilities. Moreover, chatbots offer support by facilitating language translation, global communication and accelerates research and breakthroughs. These AI enhanced capabilities transform human life, increasing productivity, inclusivity and overall well-being.

The dawn of AI dates back to the proceedings carried out by Alan Turing during the course of WWII. The decisive ascent of AI has advanced during the last decades with widening of the Internet and strengthening of microprocessor chips. AI might be the most alarming technology that this planet has ever seen. Since the 19th century's industrial revolution growth in AI goes with joined hands, with the spread of processors, that over a certain period of time have managed us to see this technology as conceptual and intellectual, even changing the human concept of intelligence. Computable Machines and Intelligence (1950) was Turing's article that gave shape to the concept of an intelligent machine. His principal benefaction was the concept that computers must be planned using the human brain as a prototype. Von Neumann (1945) proceeded with the endeavor of Turing during 1950's. He built a set of programs of machines, making use of what in early 50's was well-known on the pattern of human brain, while first operating storage system was known as the memory of the computers. At the end of 20th century, formal machines were developed that had the ability of constructing meaning, reasoning and quick fixing of algorithms.

In addition to this, the post-humanist vision analyzes to reveal that brains are a sort of computers which are coevolving with other forms of life. AI is built on the notion that once these machines are sufficiently updated; they will reproduce and increase the capacity of the human mind also. The trials which manifest how much AI is clearly distinct from the human rationale are done through Turing Test. In order to assess on what Intelligence denotes and how the machine learning is contrasting from human intelligence, the Turing test forcefully supplies the necessary awareness to the AI discipline which highlights how the

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machine imitates human thought process. Eugene Goostman (a chatbot) came to the conclusion that it is not practicable for an AI machine to be more logical than that of human because there is always a need for human factor to make AI work. In the contemporary times, AI is making rapid progress to become superior to humans in many functions, which makes it appear that humans are all set to outsource their intelligence to the technology.

The moment AI gets learning equal to or more that man's intelligence, the social and political thought is going to change altogether. Automatically that society can rise where AI has an upper hand, where may be a time can come when AI realizes that world does not need humans to colonize it anymore. It is assumed that in the future, self-producing AI could be made easily, resulting in spreading human colonies outside the Earth. The positive objective to some extent behind all of it is the influence and support in various technical benefits AI is going to provide to humanity. Max Tegmark's *Life 3.0: Being Human in the Age of Artificial Intelligence* (2017) explores the rise of AI as a potential to alter human future more than any other technology and how it will impact justice, jobs, crime, society, war and our very understanding of being human. The decisive threat that AI poses is the disastrous competition of arms and lethal independent weapons with complete dependency of human life on mechanization that will eventually result in issues of unemployment, prejudice, social discrimination and power imbalance among the communities.

Moreover, within a specified time AI has become finer and better in resolving issues as compared to human beings. For instance, pilots can lose jobs, they will be replaced by autonomous aircrafts, bank-clerks will be out because of the competitions by robotic cashiers, like these many other incidents can occur that will clearly challenge humans. As AI is progressively integrated into present-day society, on the warfront, in business, on the road, in health and education, the quest for the solution arises to the most significant question of our times: will these machines assist us or replace us? John Markoff in *Machines of Loving Grace: The Quest for Common Ground between Humans and Robots* (2015) explores the answers to these questions. On the other hand, there is nothing like AI that has brought about technological advancements that are promising hope in the medical, security and economic sector. However, speedy AI research, in the field of robotics is considered as an existential warning that is faced by the humanity. The devastating method evolved in the AI robot can add up to the danger of super intelligent system, like the aspiring project of geo-engineering which can cause damage to the eco-system. This to a great deal multiplies the apprehensiveness about the AI which is not hostile but has an added capability.

AI is clearly the next tide of mechanization, which greatly authorizes the machines to perform tasks that earlier needed human intelligence and attention. It can be said that AI can alter the form of work that is done by the humans and will definitely design various kinds of jobs with further challenges, involving the huge dependency of people on technology, leading to different types of psychological, social, mental and physical issues. To lessen the dark and ruinous after effects of AI, it is important to evolve the symbiotic attitude, which is the success and efficacy of resolving new tasks depending on the ability to allot only vital details that need compliance in the practice of distraction. The symbiosis between humans and AI is characterized by mutual benefit, where each complements the other's strengths and weaknesses (Kurzweil, 2005). This collaboration enhances human cognition by freeing humans from mundane tasks (Brynjolfsson & McAfee, 2017), to tackle complex challenges (Tegmark, 2017) and collaborate to generate innovative solutions.

Humans can excel in creativity (West, 2018), empathy, emotional intelligence (Goleman, 2005), contextual understanding and common sense (Lake et al., 2017), while AI can excel in processing speed and scalability (Davenport & Dyché, 2013), analytical capabilities, pattern recognition (Jordan & Mitchell, 2015) and data-driven decision-making (Hastie et al., 2001). As the boundaries between human and AI continue to blur, the emergence of hybrid intelligence promises to revolutionize the way humans work and innovate, by unlocking unprecedented level of productivity. It is predicted that, self-replicating AI can make settlements beyond this planet with all the potentials to colonize the space with inter-stellar travel, teleportation and the like. One of the implied promises that is central to these merits and demerits is that AI tools will one day become capable of executing difficult tasks or might even replace humans in bringing off these tasks. Latest progress in AI comes up with the chance to put a question of what is distinctive about human intelligence. We can comprehend human intelligence and the manners in which it may differs from AI by taking into consideration the computational problems that humans have to solve. Humans will continue to contribute value that cannot be reproduced by robots. Although there are various advantages of AI technology, but human intelligence which is innovative and insightful will provide grounds for AI to work. AI can only replicate, replace, broadens or extends fraction of human intelligence. Breakthroughs in algorithms interpreted by cognitive computing encourage the continuous advancement of AI into the areas such as commerce, education and medical treatments, where AI can only become an assisting agent for human

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beings. The road to ultimate dependency on AI is still a long way to go, but it is most certain that next decade is a hybrid one, as there will be new paradigm for divisions of labor between human and machines. The idea focuses on utilizing the supportive strength of AI and human intelligence, so that both can perform better than each of two could do individually (Kamar. 2016).

Findings

The symbiosis between human and artificial intelligence can lead to complementary strengths such as creativity, empathy, contextual understanding, critical thinking in humans while processing speed, scalability, analytical capabilities and data-driven decision-making in AI. Collaboration and communication, trust and reliability, human-AI interface design, education and training, ethical considerations, domain-specific applications are the thematic findings that provide a foundation for understanding the symbiosis between humans and AI.

Conclusion

Hybrid or blended approach should be evolved for the sake of providing the symbiotic merger of neural and figurative representation, in order to attain an all-around intelligible and algorithmic ability. Advocates of this attitude are of the opinion that hybrid data system will be much powerful than the sum total of various ideas separately. To lower the possible threat of AI mechanization, the logical risk managing procedure that incorporates the probable concepts of acquiring the high-priced defense, has high-value even for the lower chances of risks, can lead to a great deal of benefit (Russell, et al. 1995). It is trusted that although AI's future has a phenomenally useful influence on the economy and everyday lives of humans but still it multiplies the issues linked to unemployment, security, privacy, dependency on technology and originality enclosed in the community. Therefore, it is required to evolve the inhibitory control resulting in diminishing or weakening disputes. The concept of making AI has an objective of making life easier for humans. However, there is still a huge discussion being carried on the pros and cons of AI on the whole. The future of AI as far as industries are concerned is very bright and positive. The world is profiting from developed prosperity and higher economic growth rates, as AI is focusing at innovational human centered attitude and calculating the usefulness of robotic technology for different industrial companies of the world. It is also transforming the way different firms in the world grow bigger and compete with each other, presenting new ideas for production that can secure benefit in business. Almost all of the firms will be replacing humans with AI substitutes, that needs intelligence higher than that of humans. Moreover, it is also predicted that AI can have all the edge to colonize humans, that can be noticed as data colonization which is already taking place.

Hybrid intelligence deals with integration of human and artificial intelligence to leverage the strengths of both and create a more powerful and effective problem-solving system. It will be helpful in decision support systems, predictive maintenance, healthcare diagnosis, financial forecasting, cybersecurity, education, research and development. Further benefits include, enhanced problem-solving, improved accuracy, increased productivity, better decision-making and augmented human capabilities. The types of hybrid intelligence include humans correcting AI errors, AI assisting human decision-making, joint problem-solving and integrating human and AI cognitive models.

Hybrid intelligence refers to the harmonizing intelligence agents that are heterogeneous in nature i.e., humans and machines. The basic reasoning behind the concept of hybrid intelligence is that AI tools and humans have appreciative capabilities that can be integrated to augment each other. The fact of divergence is known as Moravec's Paradox (1990) that is right for the human sensibleness which is challenging to acquire in AI (Lake et al. 2017). Humans are not rigid but empathic, creative and adaptable to various settings. These strengths of humans and machines have directed an interplay of two different types. Both of these agents can co-develop by learning and achieving a superior effect on the system level. It would reach out to those applications where humans and technology can learn from each other in more complicated tasks than mere entertainment. Therefore, hybrid intelligence provides the chance to arrive at a phenomenal performance in a function that up till now seemed to be at the depths of human intelligence.

The co-formation of hybrid intelligence, between humans and intelligent machine will generate a sense of psychological proprietorship, increased understanding and trust because the absence of trust in AI is one of the most challenging hurdles in AI adoption up till now. Humans should not attempt at improving trust in AI, but instead find an equilibrium between belief and disbelief that makes it feasible to grip the prospects of AI, and simultaneously avoid negative outcome stemming from overdependence on AI (Lee & See. 2004).

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