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Fostering a Digital Mindset and Building Trust in AI: Practical, Short-Term Interventions

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1 Introduction

Integrating artificial intelligence in organisations and their processes presents both opportunities and challenges. Generative artificial intelligence (hereafter, GenAI), as many people refer to it, could, in a couple of years, become a headline-making technology, and this is precisely because it can generate content on its own without human effort (Feuerriegel et al., 2024). GenAI reduces the time on repetitive small tasks that would otherwise be time-consuming and allow the employees to concentrate on more strategic ones (Shamim et al., 2023). One of the necessary parts concerning the improvement of the competitiveness of firms, recognising and utilising the possibilities provided by information technologies, is that the workers need to shift their mindset to be able to effectively leverage them. The Digital Mindset is the basic and positive productivity attitude toward both existing and potential digital opportunities. This consists of being open to digital technologies and challenging existing methods and processes (Kollmann et al., 2022). The social experience that we are living through at the moment, and the turbulence caused by it, heavily influences the level of a digital mindset of employees, but most importantly the level of their workforce digital skills.
Trust in technology means that the employer knows that the employees in the company are likely to face risks as AI has the potential to enhance the output (Guitton et al., 2023). However, the role of advanced digital technologies including that of ChatGPT is urging the employees' training to achieve success in this environment. Furthermore, when we focus our research on the part of SMEs, here the goal of a digital transformation can be even more difficult to grasp and develop, as there is a lack of digital leaders and limited human resources. The research aims to find a practical intervention for their existing employees, to build not only a digital mindset but also trust in AI.

2 Material and Methods

The review focused mainly on extracting findings from the WOS and Scopus databases with insights and targeted methods that can enhance digital mindset, trust, and AI adoption within organizations. As the primary research method, this paper conducted a literature systematic review in the Web of Science (WOS) database with the keywords "Artificial Intelligence" & "Trust" & "Employees" & "Digital Mindset". The filtered records were marked as conference papers or articles written in the English language. A systematic review was also conducted in the Scopus database, where the keywords were set to "Artificial Intelligence" & "Digital Mindset" & "Organisation" & "Competence", limited to conference papers or articles, within the period 2022 to 2024. The literature analysis provided a solid base for proposing targeted interventions.

3 Results

The literature search in WOS and Scopus shows 67 articles in total. This paper aims to identify the most relevant studies within the limited time frame, as the rise of artificial intelligence and GenAI adoption is relevant for this research mainly from November 2022. This month, the first free research preview of ChatGPT was published. The literature review is classified into three groups, technology, organisations, and people, known as a TOP Framework. The framework suggests that the process of digital transformation also requires the adoption of AI technologies together with the critical skills needed to use AI efficiently, such as digital literacy, responsibility, and lifelong learning (Tursunbayeva et al., 2024). Employees' confidence and readiness for AI-related work become higher when practical training for AI applications in companies is held. The paper highlights mainly practical methods, such as Customized Training Programs, Peer Learning and Mentorship, Agile Teams for Digital Projects, or giving employees a voice (organizational listening) which increases their engagement and acceptance of AI. It is important to include employees through tools that promote ethical behavior, decision-making, and resilience (Shamim et al., 2023).
In summary, it is critical for organizations to first tackle the ethical concerns and external influences to realize the potential of GenAI in enhancing performance and developing key capabilities.

4 Conclusions

According to recent research development, a digital mindset and effective trust-building measures are beneficial in enabling a proper understanding of AI. There is literature that states that targeted training activities or peer learning programs and teams can significantly enhance digital readiness and AI-activity performance. Also, employee participation in AI projects, through organizational listening, increases acceptance and engagement. However, success in AI adoption actually extends beyond technology adoption to social issues, including ethics, responsibility, and continuous learning. Future efforts should pay attention to these issues as well as ethical issues undermining the effective deployment of AI in enhancing the organisation's performance.

References

Shamim, S.; Yang, Y.; Zia, N. U.; Khan, Z.; Shariq, S. M. Mechanisms of cognitive trust development in artificial intelligence among front line employees: An empirical examination from a developing economy. *Journal of Business Research*, (2023), 167, 114168. https://doi.org/10.1016/j.jbusres.2023.114168.

Tursunbayeva, A.; Chalutz-Ben Gal, H. Adoption of artificial intelligence: A TOP framework-based checklist for digital leaders. *Business Horizons*, (2024), 67(4), 357-368. https://doi.org/10.1016/j.bushor.2024.04.006.

Guitton, C.; Mayer, S.; Tamo-Larrieux, A.; Van Landuyt, D.; Fosch-Villaronga, E.; Kamara, I.; Pałka, P. Responsible automatically processable regulation. *AI & SOCIETY*, (2024). https://doi.org/10.1007/s00146-024-01901-7.