

Artificial intelligence can help some businesses but may not work for others

March 31 2020, by Jeanne Hedden Gallagher



Credit: CC0 Public Domain

The temptation for businesses to use artificial intelligence and other technology to improve performance, drive down labor costs, and better the bottom line is understandable. But before pursuing automation that

could put the jobs of human employees at risk, it is important that business owners take careful stock of their operations.

AI should not be applied to every [business](#) in the same manner, according to Chris Meyer, professor of practice and the director of undergraduate education at the Lally School of Management at Rensselaer Polytechnic Institute. He details his research on the subject in a new conceptual paper published today in a special issue of the *Journal of Service Management* on "AI and Machine Learning in Service Management".

"AI has the potential to upend our ideas about what tasks are uniquely suited to humans, but poorly implemented or strategically inappropriate [service](#) automation can alienate customers, and that will hurt businesses in the long term," Meyer said.

According to Meyer's findings, the choice to use automation or AI needs to be a strategic decision. If a business competes by offering a substantial amount of human interaction, or has a range of service offerings that change from client to client, the company will have a lower success rate in replacing human professionals with AI technologies. Meyer also found that the opposite is true: Businesses that limit customer choice and interaction will see greater success if they choose to automate.

Business leaders considering a switch to automation must carefully examine their strategies for managing knowledge resources. Before companies invest in AI, they need to understand whether replacing human judgment and interaction with digital technologies and algorithms is a strategically sound idea.

"The ideas are of use to managers, as they suggest where and how to use automation or human service workers based on ideas that are both sound

and practical," Meyer said. "Managers need guidance. Like any form of knowledge, AI and all forms of service automation have their place, but managers need good models to know where that place is."

Furthermore, Meyer determined that in businesses where trust and reputation are critical factors in building and maintaining a client base, people will be more likely to be effective than automated technologies. Conversely, in areas where human biases are particularly harmful to the service provision, AI will be a relatively better tool for companies to employ.

Meyer also asserts that many businesses will ultimately be using a mix of people skills and automation to effectively compete. Even AI, which can handle very sophisticated tasks, works best alongside humans—and vice versa.

"Automation and human workers can and should be used together," Meyer said. "But the extent of [automation](#) must fit with the business's strategic approach to customers."

More information: Chris Meyer et al, From automats to algorithms: the automation of services using artificial intelligence, *Journal of Service Management* (2020). [DOI: 10.1108/JOSM-05-2019-0161](https://doi.org/10.1108/JOSM-05-2019-0161)

Provided by Rensselaer Polytechnic Institute

Citation: Artificial intelligence can help some businesses but may not work for others (2020, March 31) retrieved 29 January 2023 from <https://phys.org/news/2020-03-artificial-intelligence-businesses.html>

This document is subject to copyright. Apart from any fair dealing for the purpose of private

study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.