



香港城市大學
City University of Hong Kong

Discovery-based financial education in a digital society: incorporating online artificial- intelligence tools in student-led learning activities

Project Number: 6000763

Principal Investigator: Dr. Rengong Alex ZHANG

Grant Type: TDG

Abstract:

With large amounts of data available in a digital society, the financial service industry increasingly uses artificial- intelligence tools to make decisions on lending and investing as well as detecting financial fraud. But the above applications are absent in the current accounting and finance education, which still relies on lectures explaining theories, regulations, and solving math-like problems. This project aims to reform the current teaching method to adapt to the learning needs of digitally native, millennial students. The pedagogical activities integrate real-world big data with online artificial- intelligence tools to make lending decisions, select stocks and detect financial fraud. In student-led discovery projects, students will utilize readily-available machine learning tools on AWS and Microsoft Azure to analyze the data and make business decisions. A reformed assessment framework of student-led discovery will also be provided based on both their project outcomes and how they help improve their peer's project. Besides, the project team will gather information and educational resources to develop lecture materials, case studies, and provide hands-on guidance for machine learning tools. Students will be interviewed for their experiences to further improve the content. The course materials developed and experience gathered through this project can be useful to a broad range of courses in business school. Through attending this project, students can better prepare for their future careers. We expect this project will boost employability of CityU graduates.

Academic Publication:

Qian, C., Crilly, D., Lin, Y., Zhang, K., & Zhang, R. (2022). Short-selling pressure and workplace safety: Curbing short-termism through stakeholder interdependencies. *Organization Science*. <https://doi.org/10.1287/orsc.2022.1576>

Liang, C., Qi, Y., Zhang, R., & Zhu, H. (2021). Does sunlight kill germs? Stock market listing and workplace safety. *Journal of Financial and Quantitative Analysis*. <https://jfq.org/2021/12/29/does-sunlight-kill-germs-stock-market-listing-and-workplace-safety/>