

Malta, 12.12.2021

AI and digitalization offer new opportunities for higher education

AUTHOR:

Professor Narcisa Roxana Mosteanu
American University of Malta, Malta

ABSTRACT

Digitalization and Artificial Intelligence is more and more present in our daily life and become integrated part of many businesses. It is higher education research which developed the new technologies, and now we have to integrate it in our educational processes. The partnership between human intelligence and Artificial Intelligence, through robots and robotic automated programming is coming to help to offer better educational services, from admission and tuition fees payments till grading assessments and program review. The present study was based on the interview of several teachers, students and representatives of public institutions with responsibilities in the field of higher education. The aim of this study is to show how Artificial Intelligence can improve all the services offered by an university, along with teaching and learning techniques for online environment, and which one of Porter's strategy suits more educational system, after COVID-19 pandemic. The analysis noted that they are still divergent in understanding the meaning of digital campus, with all its aspects, and how it can help enrich the structure and culture of the university campus to ensure quality teaching, research and administrative management using real innovative technologies.

KEYWORDS

Higher education system; artificial intelligence and machine learning, university services.

REFERENCES

- Facila, A. (2019, August). Data and Information Flow: Assessing Threats and Opportunities to Ensure Privacy and Investment Returns. In Proceedings of the 2019 3rd International Conference on Cloud and Big Data Computing (pp. 54-59).
- Facila, A. & Mosteanu, N. R. (2019). Accounting and blockchain technology: from double-entry to triple-entry. *The Business & Management Review*, 10(2), 108-116.
- Facila, A., Mosteanu, N. R., Cavalieri, L. P., & De Santis, G. (2020). The rise of online banks in Italy "WIDIBA Bank" Case Study. *Financial Markets, Institutions and Risks*, 4(2).
- Facila, A., Mosteanu, N. R., Fabel, M., & Capitanio, F. (2019). Accounting Information Systems and ERP in the UAE. In Proceedings of 3rd International Conference on Cloud and Big Data Computing.
- Facila, A., Mosteanu, N. R., Fabel, M., & Capitanio, F. (2019, August). Accounting Information Systems and ERP in the UAE: An Assessment of the Current and Future Challenges to Handle Big Data. In Proceedings of the 2019 3rd International Conference on Cloud and Big Data Computing (pp. 90-94).
- Mosteanu, N. R., Facila, A. (2021). FinTech Frontiers: A Comparison of Blockchain, Smart Contracts, and Open Innovation. *Journal of Open Innovation: Technology, Market, and Complexity*, 7(1), 1-9.
- Mosteanu, N. R. (2022). Improving quality of teaching finance and business management using artificial intelligence and backward design. *Quality - Access to Success*. Forthcoming February 2022.
- Mosteanu, N. R. (2022). Assessment of teaching and learning techniques for online environment: How to maintain students' attention and achieve course learning outcomes in a virtual environment using new technology. *International Journal of Innovative Research and Scientific Studies*. Forthcoming December 2021
- Mosteanu, N. R. (2021). Teaching techniques adapted for online delivery to achieve course learning outcomes in a virtual environment. *Journal of Digital Art & Humanities (JDAH)*, 2(2). Forthcoming
- Mosteanu, N. R. (2021). Digitalization and Backward Design take the finance teaching techniques and study plan strategy one step further. *Journal of Digital Art & Humanities (JDAH)*, 2(2). Forthcoming
- Mosteanu, N. R. (2022). Backward design and machine learning actual tools to improve the education journey in finance and business academic study plan. *Proceedings of 8th IJDEE 2022*. Forthcoming
- Mosteanu, N. R. (2022). Financial Intelligence – the 21st century perfect teamwork artificial intelligence, machine learning, robots and business intelligence. *Proceedings of 8th ICEBA 2022*. Forthcoming
- Mosteanu, N. R. (2021). Artificial Intelligence helping the fight against Covid-19: Supporting the pharmaceutical industry beyond the financial aid. *Proceeding of 8th ICSEI 2021*. Forthcoming
- Mosteanu, N. R. (2021). Did Covid-19 social restrictions change the financial and budgetary policy objectives, paying more attention to the pharmaceutical industry? Evidence from a European countries' perspective. *Journal of open innovation: Technology, Market, and Complexity*
- Mosteanu, N. R. (2021). Digital Campus – a future former investment in education for a sustainable society. In EJS Web of Conferences, 234, p. 00009. EDP Sciences.
- Mosteanu, N. R. (2020). Artificial Intelligence and Cyber Security – A Shield against Cyberattack as a Risk Business Management Tool – Case of European Countries. *Quality-Access to Success Journal*, 21(173), 148-156.
- Mosteanu, N. R. (2020). Challenges for Organizational Structure and design as a result of digitalization and cybersecurity. *The Business and Management Review*, 11(1), p. 278-286.
- Mosteanu, N. R. (2020). Management of Disaster and Business Continuity in a Digital World. *International Journal of Management*, 11(4), p. 169-177.
- Mosteanu, N. R. (2020). Green Sustainable Regional Development and Digital Era. In Green Buildings and Renewable Energy, Ch.13, p. 189-197.
- Mosteanu, N. R. (2020). Socio-Financial Disruption - Key tips to manage and ensure the business continuity. *Global Journal of Social Sciences Studies*, 6(2), p.87-95.
- Mosteanu, N. R. (2020). Finance digitalization and its impact on labour market. *Technum Social Sciences Journal*, 8(June 2020), p.998-1005.
- Mosteanu, N. R. (2020). Using internet and EdTech become a primary need rather than a luxury – the reality – a new skilled educational system – Digital university campus. *International Journal of Engineering Science Technologies*, 4(6), in press.
- Mosteanu, N. R., Mosteanu M. (2020). Risk assessment of financing Biotechnology projects to develop a healthy social and business environment. Published in Proceedings of 28th European Biomass Conference & Exhibition, EUBCE 2020, Marseille, France, July 6-7, p. 921-925.
- Mosteanu, N. R. (2020). Financial and economic policies for a sustainable development through Green Economy and Artificial Intelligence. *European Biomass Conference and Exhibition Proceedings*, 2020, p. 917-920.
- Mosteanu, N. R. (2020). Education, qualification awareness and social civility to build and sustain a healthy and developed society. *European Biomass Conference and Exhibition Proceedings*, 2020, p. 926-929.
- Mosteanu, N. R., Facila, A., Cavalieri, L. P., & Iblah, S. (2020). Digital Technologies' Implementation within Financial and Banking System during Socio Distancing Restrictions – Back to the Future. *International Journal of Advanced Research in Engineering and Technology*, 11(6), p. 307-315.
- Mosteanu, N. R. (2020). Financial and economic policies for a sustainable development through Green Economy and Artificial Intelligence. *European Biomass Conference and Exhibition Proceedings*, 2020, p. 917-920.
- Mosteanu, N. R. (2019). International Financial Markets face to face with Artificial Intelligence and Digital Era. *Theoretical and Applied Economics*, 26(3), 123-133.
- Mosteanu, N. R. (2019). Safety finance – a different approach – Conventional versus Islamic. *Proceedings of 8th International Conference on Advances in Social Science, Management and Human Behavior - SMHB 2019*, 24-31
- Mosteanu, N. R. (2019). International Financial Markets under Artificial Intelligence Influence. *Vision 2020: Education Excellence and Management of Innovations through Sustainable Economic Competitive Advantage*, p.818-827.
- Mosteanu, N. R. (2019). New Approach of Regional Development: Innovation through Green Economy and Artificial Intelligence. *Vision 2020: Education Excellence and Management of Innovations through Sustainable Economic Competitive Advantage*, p.188-204.
- Mosteanu, N. R. (2019). Principles of International Finance, Banking and Taxation. Editura Universitară, București.
- Mosteanu, N. R. (2019). Intelligent Foreign Direct Investments to boost economic development – UAE case study. *The Business & Management Review*, 10(2), p.11-9.
- Mosteanu, N. R. (2018). Relevance of data accuracy for research and forecasts in financial and fiscal management process. *International Journal of Development Research*, 8(7), 21933-21936.
- Mosteanu, N. R. (2017). Currency pegged to a foreign currency – OTC and Europe models. *The Business and Management Review*, 9(1), 29-62.
- Mosteanu, N. R. (2017). Home currency pegged into Euro – possible solution for Romania's economy. *Economia Journal*, 6(3), 434-443.
- Mosteanu, N. R. (2017). What is the future of banking industry? Different approaches Islamic vs conventional systems. *Economia*, 5(3), p. 429-431.
- Mosteanu, N. R. (2017). The implications of financial markets on countries' economic life. *Economics World Journal*, 5(3), p. 268-280.
- Mosteanu, N. R. (2016). Implication of fiscal policy for the Romanian economy during 2000 – 2015. *EcoForum*, 4(1), 143-150.
- Mosteanu, N. R. (2015). Administrative reorganization of Romania versus Reorganization. *Metahurgia*, Volume 46(1), 119-123.
- Mosteanu, N. R. (2015). Efficiency of public revenues in Romania. *Metahurgia International*, 16(12), 87-90.
- Mosteanu, N. R. (2015). How to avoid international double taxation. *Metahurgia Journal*, 6(97), 69-72.
- Mosteanu, N. R. (2015). Influence of financial policy about the employment in Romania. *Budgetary Research Review*, 3(1), 3-19.
- Mosteanu, N. R. (2015). Regionalization of Romania. *Quality - Access to Success*, 12(2), 602-606.
- Mosteanu, N. R. (2015). Romania's fiscal budgetary strategy. *Quality - Access to Success*, 12(2), 606-609.
- Mosteanu, N. R. (2015). Technical fiscal – Fiscal Techniques, and ed. Editura Universitară, București.
- Mosteanu, N. R. (2015). The importance of fiscal budgetary strategy within Romanian economy. *Metahurgia International*, 16(12), 125-127.
- Mosteanu, N. R. (2015). Verdictul analizei macroeconomice. *Tribuna Economica Journal*, 14(8), p.114-122.
- Mosteanu, N. R., Văcina A. (2009). The tax evasion as a measure against economic crisis in Romania. *Metahurgia International*, 14(8), p.114-122.
- Mosteanu, N. R. (2003). Dubla Impunere Internationala. Editura Didactică și Pedagogică, București.
- Mosteanu, N. R. (2003). Finanțarea dezvoltării regionale în România. Editura Economică, București.
- Mosteanu, N. R. (2004). Finanțe Publice. Editura Universitară, București. Mosteanu, N. R. (2004). Impozite și taxe. Editura Economică, București.
- Mosteanu, T., Stroe, R., Negrea E., Mosteanu N. R., Campeanu E., Stoian A., Vasilescu D., Anitai G., Mircescu E., Lacatus C. (2004). Incidenta factorilor instititionali ai si sistemelor de interese asupra mediului economic-financiar si social din Romania, in contextul integrării Europene. *Economica*, Editura ASE, Bucuresti, Romania, ISSN 1454-0320, p.177-191
- Mosteanu, N. R. (2009). Tehnici fiscale- Fiscal techniques. Editura Universitară, București.
- Mosteanu, N. R. & Facila, A. (2020). Digital Systems and New Challenges of Financial Management-FinTech, XBRL, Blockchain and Cryptocurrencies. *Quality-Access to Success*, 21(174).
- Mosteanu, N. R., Facila, A. & Cavaleri, L. P. L. (2020). Digitalization and green economy - changes of business practices. In Proceedings of 4th International Conference on Cloud and Big Data Computing (ICCBDD), Liverpool, UK, August 26-28, 2020, p.118-122
- Mosteanu, N. R., Facila, A. & Cavaleri, L. P. L. (2020). Disaster Management - Digitalization and Financial Resources - important factors to keep the organization ongoing. In Proceedings of 4th International Conference on Cloud and Big Data Computing (ICCBDD), Liverpool, UK, August 26-28, 2020, p.108-112
- Mosteanu, N. R., Facila, A., Torrebruno, G. (2019). The severest financial decision tools. *The Business & Management Review*, 10(2), 86-97.
- Mosteanu, N. R., Facila, A., Torrebruno, G., Torrebruno, F. (2019). Pratiche: A Smart Financial Tool to Assess Business Management Decisions. *Journal of Information Systems & Operations Management*, 13(1), 45-56.
- Mosteanu, N. R., Mosteanu, T., Akhshaf, C., Bolocin, M. M. (2019). Finance: Challenges of Digital Era. Editura Universitară, București.
- Petras, P. & Facila, A. (2019, August). Accounting Information Systems and System of Systems: Assessing Security with Attack Surface Methodology. In Proceedings of the 2019 3rd International Conference on Cloud and Big Data Computing (pp. 100-103).
- Facila, A. 2020. X-Accounting @ - Towards a new Accounting System. Blockchain applied accounting. How robots will overcome humans in accounting Recording. www.alexander.it
- Elweri, A. (2020). Social and Environmental Responsibility Linked to a Company's Financial Performance. www.alexander.it
- Facila, A. (2020). New Technologies in Forensic Accounting and Auditing. www.alexander.it
- Matarun-Des-Santos, L. J., Hamel, M. A. (2020). Augmented reality in Dubai parks: A gaming approach to curb COVID-19. www.alexander.it
- Mosteanu, N. R. (2020). Financial investment's challenges in 2020 – time for education and professional development. www.alexander.it
- Mosteanu, N. R. (2020). Investment in education as part of a country national strategic plan. www.alexander.it
- Mosteanu, N. R. (2020). Regional financial and economic development under travelling restrictions and technologies loop. www.alexander.it
- Mosteanu, N. R. (2020). Socio-Financial Disruption - Key tips to manage and ensure the business continuity. *Global Journal of Social Sciences Studies*, 6(2), p.87-95
- Mosteanu, N. R. (2020). Using internet and EdTech become a primary need rather than a luxury – the reality – a new skilled educational system – Digital university campus. *International Journal of Engineering Science Technologies*, 4(6), p. 1-9
- Mosteanu, N. R. (2020). Digital University Campus – change the education system approach to meet the 21st century needs. *European Journal of Human Resource Management Studies*, 4(1), p.79-93
- Mosteanu, N. R. (2003). Dubla Impunere Internationala. Editura Didactică și Pedagogică, București.
- Mosteanu, N. R. (2021). Did Covid-19 social restrictions change the financial and budgetary policy objectives, paying more attention to the pharmaceutical industry? Evidence from a European countries' perspective. *Journal of open innovation: Technology, Market, and Complexity*
- Mosteanu, N. R. (2021). Digital Campus – a future former investment in education for a sustainable society. In EJS Web of Conferences, 234, p. 00009. EDP Sciences.
- Mosteanu, N. R. (2020). Artificial Intelligence and Cyber Security – A Shield against Cyberattack as a Risk Business Management Tool – Case of European Countries. *Quality-Access to Success Journal*, 21(173), 148-156.
- Mosteanu, N. R., Facila, A., Cavalieri, L. P., & Iblah, S. (2020). Digital Technologies' Implementation within Financial and Banking System during Socio Distancing Restrictions – Back to the Future. *International Journal of Advanced Research in Engineering and Technology*, 11(6), p. 307-315.
- Mosteanu, N. R. (2020). Intelligent tool to prevent Economic Crisis – Fractals. A possible solution to assess the Management of Financial Risk. *Quality-Access to Success Journal*, 20(172), 13-17.
- Mosteanu, N. R. (2019). International Financial Markets face to face with Artificial Intelligence and Digital Era. *Theoretical and Applied Economics*, 26(3), 123-133.
- Mosteanu, N. R. (2019). Safety finance – a different approach – Conventional versus Islamic. *Proceedings of 8th International Conference on Advances in Social Science, Management and Human Behavior - SMHB 2019*, 24-31
- Mosteanu, N. R. (2019). New Approach of Regional Development: Innovation through Green Economy and Artificial Intelligence. *Vision 2020: Education Excellence and Management of Innovations through Sustainable Economic Competitive Advantage*, p.188-204.
- Mosteanu, N. R. (2019). Principles of International Finance, Banking and Taxation. Editura Universitară, București.
- Mosteanu, N. R. (2019). Assessment of teaching and learning techniques for online environment: How to maintain students' attention and achieve course learning outcomes in a virtual environment using new technology. *International Journal of Innovative Research and Scientific Studies*. Forthcoming December 2021
- Mosteanu, N. R. (2021). Teaching techniques adapted for online delivery to achieve course learning outcomes in a virtual environment. *Journal of Digital Art & Humanities (JDAH)*, 2(2). Forthcoming
- Mosteanu, N. R. (2021). Digitalization and Backward Design take the finance teaching techniques and study plan strategy one step further. *Journal of Digital Art & Humanities (JDAH)*, 2(2). Forthcoming
- Mosteanu, N. R. (2022). Backward design and machine learning actual tools to improve the education journey in finance and business academic study plan. *Proceedings of 8th IJDEE 2022*. Forthcoming
- Mosteanu, N. R. (2022). Financial Intelligence – the 21st century perfect teamwork artificial intelligence, machine learning, robots and business intelligence. *Proceedings of 8th ICEBA 2022*. Forthcoming
- Mosteanu, N. R. (2021). Artificial Intelligence helping the fight against Covid-19: Supporting the pharmaceutical industry beyond the financial aid. *Proceeding of 8th ICSEI 2021*. Forthcoming
- Mosteanu, N. R. (2021). Did Covid-19 social restrictions change the financial and budgetary policy objectives, paying more attention to the pharmaceutical industry? Evidence from a European countries' perspective. *Journal of open innovation: Technology, Market, and Complexity*
- Mosteanu, N. R. (2021). Digital Campus – a future former investment in education for a sustainable society. In EJS Web of Conferences, 234, p. 00009. EDP Sciences.
- Mosteanu, N. R. (2020). Artificial Intelligence and Cyber Security – A Shield against Cyberattack as a Risk Business Management Tool – Case of European Countries. *Quality-Access to Success Journal*, 21(173), 148-156.
- Mosteanu, N. R. (2020). Challenges for Organizational Structure and design as a result of digitalization and cybersecurity. *The Business and Management Review*, 11(1), p. 278-286.
- Mosteanu, N. R. (2020). Management of Disaster and Business Continuity in a Digital World. *International Journal of Management*, 11(4), p. 169-177.