
Editorial

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Biographical notes: Abbas A. Tarhini is a Member of the Association for Information Systems (AIS) and an Honourable member of the Beta Gamma Sigma honour society. He is the president-elect of the Middle East and North Africa Association for Information Systems (MENA-AIS), the AIS MENA chapter and the VP for research at the Lebanese Association for Information Systems-AIS Lebanon chapter. He is a Faculty member at the Information Technology and Operations Management Department at the Lebanese American University. He received his BS and MS in Computer Science from the Lebanese American University (LAU) and the PhD in Information Systems from University of Reims, France. His research interests include ICT adoption and implementation, information security, applications of data mining, distributed systems synchronisation, logistics, and stochastic search algorithms relevant for finding solutions to business problems like vehicle routing and task scheduling. His research has been published in recognised journals including *IEEE Transactions on Intelligent Systems, Journal of Business Research* and more. He has organised a number of international conferences. He is the treasurer of the ACS society – Lebanon chapter.

Antoine Harfouche is an Associate Professor of Information Systems and Digital Business at Paris Nanterre University (UPN). He teaches Information Systems, Data Analytics, Digital Business, and Quantitative Methods (Statistics and Data Science) for undergraduates, graduate and PhD students. His research areas revolve around artificial intelligence, block chain and digital business. His publications appeared in peer-reviewed journals and renowned conferences such as *International Conference of Information Systems*. He is Member of the Association for Information Systems (AIS). He is the President of the MENA-AIS chapter, the immediate past President of the Lebanese AIS chapter (LAIS), and the past President of the international association ICTO (Information and Communication Technologies in Organizations and Society). He is responsible for the International Relations of the Business Department

of University Paris Nanterre (UPN). Throughout his professional career, he has reconciled teaching, research, scientific network, and administrative responsibilities.

Today, the role of information and communication technologies (ICTs) in shaping human activities in organisations and societies is becoming very prominent. In fact, the effect of ICT is now ubiquitous and affects different aspects of our lives, starting from the social life where human behaviours and needs are better understood, ending with other aspects such as the educational and, even more, the financial systems.

This special issue sheds the light on how ICT is understood, adopted, adapted, and used within different organisations and more generally, within the society as a whole, hoping to have ICT for a better life and a better world. In this special issue, the first paper proposes a framework to understand the semantics of the different types of enterprise interactions in order to decide on the required standard architectures and services of needed technologies. The second and third papers discuss social media platforms and frameworks that help to rank users and understand their behaviours, attitudes and expectations. The fourth paper proposes a research framework to assess IT adoption for e-learning systems. The fifth and sixth papers examine the effect of perceived risk and awareness on the intention to adopt mobile banking and the consequences of banking innovative developments on corporate social responsibility (CSR).

Services improvements are directly affected by enterprise interaction and the framework that these services operate within. Accordingly, the first paper of this issue, 'Enterprise interactions: conceptualisation, ontology, and standard architectures and services' proposes a framework to understand the semantics of the different types of enterprise interactions, in order to rationally decide the required standard architectures and services that facilitate the integration with the needed technologies such as extended social websites, Internet of Things, web services and micro-services-based SOA, and cloud computing.

As social media platforms (SMP) are becoming a treasured resource for data analytics, the second paper, 'Lexicon-based sentiment analysis approach for ranking event entities' presents a novel approach to rank individuals-event entities during a special event focusing on a lexical approach based on Facebook and Twitter platforms. Results show that by associating both features from Facebook and Twitter and by using reactions, we can successfully rank entities participating in a specific event having high precision.

The third paper, 'Social media applications framework: a lexical analysis of users online reviews' examines important issues in user experience about social media applications (SMAs) by using a lexical approach. The study presents a mapping of six factors which characterise the user of the social media. Accordingly, a profile of social media user is created to help in analysing and understanding users' attitudes and expectations according to a given media and personal characteristics.

As information and communication technology (ICT) is making the leap to transform all aspects of life, online learning has become widely viewed as the future of education. The fourth paper, 'Online learning usage and performance among students within public universities in Yemen' develops a research framework to assess IT adoption of e-learning

systems by students in Yemen. It extends the Delone & Mclean Information System Success Model (DMISM) to create a comprehensive model that comprises five main antecedents as independent variables; in addition to actual usage, user satisfaction and cognitive absorption as mediating variables, and performance impact as the dependent variable. The anticipated findings will provide a guideline for both policymakers and university management.

Mobile banking is having a transformative effect on developed and developing economies and is valued by users with different backgrounds. The fifth paper, 'The effect of awareness and perceived risk on the technology acceptance model (TAM): mobile banking in Yemen', examines the effect of perceived risk and awareness as external variables on the technology acceptance model for a comprehensive understanding of intention to use mobile banking services. The proposed research model explained 78% of the variance in intention to use mobile banking services. The findings of the multivariate analysis revealed that awareness reduces the perception of risk and perceived risk is a major attenuator for the perceived ease of use, and perceived usefulness. Awareness also had a significant impact on the perceived usefulness (PU) and Perceived Ease of Use (PEOU). In addition, PU was found as a major predictor of the intention to adopt mobile banking.

Such innovative developments in banking activities would definitely have consequences on the corporate social responsibility (CSR). The last paper, 'ICT and CSR in the Lebanese banking sector, towards a regain of stakeholders' trust: the case of Bank Audi', studies CSR as a source of value for the banking sector. Using a qualitative approach, the paper proposes to study the CSR initiatives, while focusing on ICT contributions in integrating CSR to promote a regain of trust with its stakeholders.

Finally, we would like to thank the authors, and hope that the readers will enjoy reading and benefit from the papers presented in this special issue and we would greatly appreciate any comments on this issue.