
Editorial

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Biographical notes: Pavlos Delias is an Assistant Professor with Kavala Institute of Technology, Greece. He holds a jointly supervised PhD in Informatics from both Technical University of Crete and University Paris Dauphine. He has received multiple scholarships and awards during his studies. He self-declares his occupational and research field as: ‘Applications of operational research in information systems’ while his research interests are in the areas of process mining, workflow management, agent-based methodologies, and multicriteria analysis. He has contributed to numerous projects as a Research Associate, focusing on applying the principles of operational research to information systems design and use. He has also published several articles in journals and conference proceedings.

Hellenic Operational Research Society (HELORS) was founded nearly 50 years ago (in 1963) by pioneer Greek scientists aiming to promote teaching and use of operational research methodologies for the benefit of the Greek economy and society. HELORS was developed as a scientific society with an important presence in the scientific and economical life of Greece with 300 members and several activities. As a part of its efforts to promote and stimulate scientific research and disseminate knowledge at a national level, HELORS has created workgroups (WGs), which include scholars and practitioners with similar research interests. A WG has goals such as: strengthen the network of its members, disseminate knowledge and information effectively, organise events, co-authoring publications and in general, take any initiative seems prosperous for the promotion of the WG’s specific topic. The WG ‘multiple criteria decision aid’ focuses on the field of decision support and decision making while considering multiple criteria.

The 9th Meeting of Multiple Criteria Decision Aid took place as part of a meeting series, realised over the previous years. We consider the success of those meetings as a clear sign of the intensive research by Greek scholars of the field. The aim of the 9th Meeting was to allow scholars and practitioners of MCDA in MIS to present their work and share their research. The conference has been organised by Kavala Institute of Technology, and it was held in its premises on October 11–13, 2012. The national community has demonstrated particular interest in submitting its research work and participating to the conference activities. Out of the 36 articles initially submitted, seven articles were finally selected for this special issue.

In the first paper, Odysseas Moschidis deals with the grouping of individuals, who are determined by a number of categorical, ordinal and quantitative variables. The usual answer to this problem has to do with the coding of the certain categorical and ordered data in a logical table (0–1) under the form: individuals x variables. His research suggests a new encoding of the quantitative ordinal variables that leads to a new, more detailed

encoding of categorical and ordinal variables in a new general table of percentages, the hierarchical classification of which provides more detailed results.

Ioannis N. Vatsos, Panagiotis Angelidis, Alexandros Theodoridis and Christos Batzios challenge monoculture, which have been the prevailing fish and shellfish farming system in Greece. They argue in favour of the concept of integrated aquaculture (a production system in which different species are cultured together) in order to reduce the environmental impacts of aquaculture and/or to reduce the feeding cost. In particular, they present how people have attempted to integrate mussel and micro- or macro-algae culture into open-sea or land-based fish farming. When certain criteria are met, such integrated systems could improve the sustainability of the farms, mainly through the reduction of the waste treatment cost and the use of the mussels or the algae in the diet of the farmed fish.

In the next paper, Christos Keramydas, Dimitris Tsiolias, Dimitris Vlachos and Eleftherios Iakovou, discusses how globalisation and technological evolution associated with critical socioeconomic changes altered the traditional supply chain (nature, and the corresponding risk forms and their effects (delays and disruptions of product, money, and information flows). Their work focus on the evaluation of emergency sourcing risk mitigation strategies for a discrete part manufacturer, employing a quantitative approach. Specifically, a discrete event simulation methodology is developed to measure the risk impacts on the organisation's performance, and the evaluation of alternative emergency/dual sourcing policies. Authors recommend an optimal emergency capacity and they compute the associated cost savings.

The fourth paper by Lambros Tsourgiannis et al., aims at exploring consumers' purchasing behaviour towards paper products that could be derived from transgenic plantations. Through field interviews and data analysis the main factors affecting consumers' purchasing behaviour were revealed. Authors conclude that environmental and economic impacts mainly influence consumers' attitudes towards biotechnology use in forest trees. Through cluster techniques, authors profile each consumer group according to personal characteristics and their attitude.

Georgios N. Aretoulis, Christophoros H. Triantafyllidis, Jason Papathanasiou and Ioannis K. Anagnostopoulos focus on creating a novel approach for selecting the most efficient construction project designers (CPD). A plethora of attributes of a designer were identified and prioritised through a structured questionnaire survey. Clustering methods and multiple criteria analysis were used to shape profiles, rank available project designers and identifying the most competent one. As a valuable add-on, a case study was conducted, which highlighted the most eligible designer based on the proposed methodology.

Next, Fotis Kitsios et al. highlight the new service development as a key determinant of diversification strategy in the hospitality industry. The innovation of this work concerns the identification of critical success factors, which in this study was attempted with the use of multicriteria methodologies. Data was collected using in depth structured and questionnaire-based interviews with hotel managers in a representative sample of hotels in Eastern Macedonia. Authors work aims to justify the validity of the adopted model as a general approach that predicts the success of a new hospitality service based on a set of critical factors.

The final paper of Ioannis Petasakis, Theodosios Theodosiou, Ioannis Kazanidis and Stavros Valsamidis, presents how the weighted sum model is applied in order to evaluate online courses uploaded in a learning management system. An interesting part of their

work is that they present a case study of a two-phase evaluation (one before announcing the evaluation results to educators and one after), which exhibits how educators strived to improve their performance.

Being the guest editor of this issue, I would like to thank the authors of the papers and the anonymous reviewers for their time and efforts to fulfil this endeavour. I would also like especially to thank Professor John Wang, the Editor-in-Chief of *IJDATS*, for his trust, support, and confidence to a successful outcome.