Editorial

Peiyi Zhu*

School of Electrical & Automatic Engineering, Changshu Institute of Technology, Suzhou, China Email: zhupy@cslg.edu.cn *Corresponding author

Dimitri Lefebvre

UNIHAVRE, GREAH, Normandie University, Le Havre, 76600, France Email: dimitri.lefebvre11@gmail.com

Ahmed Chemori

Laboratoire d'Informatique, de Robotique et de Microélectronique de Montpellier, CC 477, 161 rue Ada, 34095 Montpellier Cedex 5, France Email: ahmed.chemori@lirmm.fr

Jawhar Ghommam

College of Engineering, Sultan Quaboos University, Muscat, Oman Email: jawher@squ.edu.om

Biographical notes: Peiyi Zhu received his MSc and PhD both from the School of Internet of Things Engineering from Jiangnan University, Wuxi, China. Now he is an associate professor in the School of Electrical & Automatic Engineering, Changshu Institute of Technology. He is a 'six big talent peak' of Jiangsu Province candidate and a Jiangsu Province University 'Blue Project' excellent young backbone teacher. From 2011 to 2012, he was a joint training of graduate student between the University of Western Australia and Jiangnan University. From 2016 to 2017, he was a Visiting Research Fellow with the University of Western Australia. His research interests are related to intelligent information processing, intelligent control and computational intelligence.

Dimitri Lefebvre graduated from the Ecole Centrale of Lille in France in 1992. He received his PhD in Automatic Control and Computer Science from the University of Sciences and Technologies, Lille in 1994, and his HAB from University of Franche Comté, Belfort, France in 2000. Since 2001, he has been a Professor at the Institute of Technology and Faculty of Sciences, University Le Havre, France. He is with the Research Group on Electrical Engineering and Automatic Control (GREAH) and from 2007 to 2012 he was the head of the group. His current research interests include control and diagnosis issues for continuous, discrete and hybrid systems and their applications to electrical engineering.

Ahmed Chemori received his MSc and PhD, both in automatic control, from the Polytechnic Institute of Grenoble, France, in 2001 and 2005 respectively. During 2004–2005 he was a research and teaching assistant at Laboratoire de Signaux et Systèmes (LSS - Centrale Supelec) and University Paris 11. Then he joined Gipsa-Lab (Former LAG) as a CNRS postdoctoral researcher. He is currently a senior research scientist in automatic control and robotics for the French National Center for Scientific Research (CNRS), at the Montpellier Laboratory of Computer Science, Robotics and Microelectronics (LIRMM). His research interests include nonlinear (adaptive and predictive) control and its real-time applications in different fields of robotics (under-actuated robotics, parallel robotics, underwater robotics, humanoid robotics and wearable robotics).

Jawhar Ghommam is an Associate Professor of Control Engineering at Sultan Quaboos University in Oman. He obtained the DEA (MSc) degree from the University of Montpelier at the Laboratoire d'Informatique, Robotique et Micro-électronique (LIRMM, France) in 2004, and in 2008 a PhD in Control Engineering jointly from the National Engineering School of Sfax and the University of Orleans. From 2008 to 2017 he was with the National Institute of Applied Sciences and Technology, where he held a tenured associate professor at the Department of Physics and Instrumentation. His research interests include nonlinear control of under-actuated mechanical systems, adaptive control, guidance and control of autonomous vehicles, and cooperative motion of non-holonomic vehicles.

With the rapid development of information science and intelligent manufacturing techniques, many industries have undergone great changes, where the production equipment and industrial processes are becoming more complex. Therefore, the modelling, identification and control (MIC) research and practice is essential in practical industries, such as multichannel communication systems, network environments, flight control systems, industrial processes and magnetic compressors and magnetic fluids. Some related researches, e.g. system identification, dynamic modelling, and process control, have received much attention for decades, while there still are certain issues to be further investigated. Hence, this special issue presents advanced methodologies and techniques related to system identification, dynamic modelling, and process control, which bridge theoretical studies and applications in all engineering and science branches. It provides an international forum for professionals, academics, and researchers over the world to share latest developments from interdisciplinary theoretical studies, computational algorithm developments and applications.

The research articles of this special issue were from the 2018 International Symposium on Modelling, Identification and Control (ISMIC 2018), which received 43 submissions from around the world. All papers went through a rigorous peer-review procedure and each paper received at least two review reports. Based on the review reports, the program committee finally selected 30 papers for presentation at ISMIC 2018. Among these papers, 15 high-quality papers went through the normal review process of the journal and were accepted after strict modification.

The guest editors would like to thank all the authors for submitting their manuscripts to this special issue. We would also like to acknowledge the international program committee of ISMIC 2018 for their support and the reviewers for their contributions in reviewing the papers and providing constructive comments that helped authors to improve the papers. Finally, we thank Prof. Quan Min Zhu (the Editor-in-Chief of *International Journal of Computer Applications in Technology*) for his consistent support, which makes the publication of this special issue possible in such a short period.