Preface

The Asia Simulation Conference is an annual simulation conference organized by the following Asian simulation societies: the Korea Society for Simulation (KSS), the China Simulation Federation (CSF), the Japan Society for Simulation Technology (JSST), the Society of Simulation and Gaming of Singapore, and the Malaysia Simulation Society (MSS). This conference provides a forum for scientists, academicians, and professionals from around the world. With this goal in mind, the Federation of Asia Simulation Societies (ASIASIM) was formed in 2011. The main purpose of ASIASIM is to provide an Asian forum for regional and national simulation societies to promote the advancement of modeling and simulation. As a leading conference in the field of simulation, the 17th Asia Simulation Conference (AsiaSim 2017), held in Melaka, Malaysia, aimed to be the premier forum for researchers and practitioners from academia and industry in the Asia Pacific region to share their ideas, research results, and experiences, thus promoting research and technical innovation in these fields domestically and internationally.

The papers presented at this conference have been collected in this volume of the series Communications in Computer and Information Science. The papers contained in these proceedings address challenging issues in modeling and simulation in various fields such as embedded systems, symbiotic simulation, agent-based simulation, parallel and distributed simulation, high performance computing, biomedical engineering, big data, energy, society and economics, medical processes, simulation language and software, visualization, virtual reality, modeling and simulation for IoT, machine learning, as well as the fundamentals and applications of computing. This year, AsiaSim received 263 submissions. After a thorough reviewing process by the Technical Committee, 124 papers were selected for presentation as full papers, with an acceptance rate of 47.1%. This volume contains 60 full papers presented at AsiaSim 2017 and divided into 2 main tracks, namely: Modeling and Simulation: Algorithms and Methods; and Modeling and Simulation of Systems.

The high-quality program would not have been possible without the authors who chose AsiaSim 2017 as a venue for their publications. We are also very grateful to the Program Committee members and Organizing Committee members, who put a tremendous amount of effort into soliciting and selecting research papers with a balance of high quality and new ideas and applications.
We hope that you enjoy reading and benefit from the proceedings of AsiaSim 2017.

August 2017

Mohamed Sultan Mohamed Ali
Herman Wahid
Nurul Adilla Mohd Subha
Shafishuhaza Sahlan
Mohd Amri Md. Yunus
Ahmad Ridhwan Wahap
Modeling, Design and Simulation of Systems
2017, XXV, 727 p. 451 illus., Softcover