

Preface

This volume contains a selection of papers accepted and presented at the 7th Balkan Conference on Informatics: Advances in ICT, which was held during September 2-4, 2015, in Craiova, Romania.

Balkan Conference on Informatics: Advances in ICT continued the tradition of the successful BCI series of conferences previously held in Thessaloniki (2003), Ohrid (2005), Sofia (2007), Thessaloniki (2009), Novi Sad (2012) and Thessaloniki (2013).

The main objective of the BCI series of conferences is to provide a forum for dissemination of research accomplishments and to promote interaction, discussions and collaboration among scientists from South-East European countries and the rest of the world.

The entire ICT community of Craiova joined efforts and contributed to the organisation of this year's Conference:

- Department of Computers and Information Technology, Faculty of Automation, Computers and Electronics, University of Craiova, Romania
- Department of Informatics, Faculty of Mathematics & Natural Sciences, University of Craiova, Romania
- Department of Statistics and Business Informatics, Faculty of Economics and Business Administration, University of Craiova, Romania
- Intelligent Distributed Systems Research Group, University of Craiova, Romania
- SyncRO Soft Company, Craiova, Romania

Traditionally, BCI conferences call for papers deals with theory and/or applications in wide areas of ICT. The papers included in thi volume belong to the following areas:

- Computer Networks
- Databases and Information Systems
- E-learning
- Informatics Education
- Natural Language Processing
- Ontologies
- Signal Processing
- Software Agents

11 papers were accepted and published in the CEUR Proceedings. All papers were at least triple reviewed by members of an International Programme Committee and were selected during a rigorous process.

Five leading scientists have been invited to give keynote talks in the conference:

- **Michael Luck**, Professor of Computer Science at the Department of Informatics, King's College London, UK and Dean of Faculty of Natural and Mathematical Sciences King's College London, UK
- **Zoran Budimac**, Full Professor at the Department of Mathematics and Informatics, Novi Sad University, Serbia

- Marius Leordeanu, Senior research scientist at the Institute of Mathematics of the Romanian Academy
- George Bînă, Co-founder of SyncRO Soft Company, Romania
- Dragoş Valentin Ene, Researcher at the National Institute for Research and Development in Optoelectronics (INOE), Romania.

Many people have contributed to the success of Balkan Conference on Informatics: Advances in ICT 2015 conference. We would like to thank our distinguished keynote speakers and the authors of the papers presented. We are grateful to all members of the BCI Committees for their enthusiasm and time investment towards the successful organisation of the conference. Special thanks go to the Programme Committee members and reviewers for accepting the workload in a tight schedule and for submitting their opinions and careful comments on the papers. Last, but not least, we thank all the participants for making BCI'15 a live, fruitful scientific event.

The Conference General Chairs:

- Costin Badica, University of Craiova, Romania
- Yannis Manolopoulos, Aristotle University, Greece

The Editors of the Balkan Conference on Informatics: Advances in ICT Volume and Programme Committee Chairs:

- Amelia Badica, Department of Statistics and Business Informatics, Faculty of Economics and Business Administration, University of Craiova, Romania
- Mihaela Colhon, Department of Informatics, Faculty of Mathematics & Natural Sciences, University of Craiova, Romania

The Programme Committee Chairs:

- Mirel Cosulschi, University of Craiova, Romania
- George Eleftherakis, The University of Sheffield International Faculty, Greece
- Florin Leon, Technical University "Gheorghe Asachi" of Iasi, Romania

Craiova, September 2015