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ICTAI 2023

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Message from the General Chair
ICTAI 2023

On behalf of the organizing committees, we welcome you to the 35th IEEE International Conference on Tools with Artificial Intelligence (ICTAI 2023) held in Atlanta, GA, USA.

First of all, we really appreciate the authors who submitted their papers and participated in the conference activities. We also appreciate the time and effort of the area chairs, program committee members, the reviewers for advertising the conference and evaluating the papers.

Most of all we would like to express our great appreciation to this year's Program Chairs, Professors Ming Yang and Gennaro Cordasco, for their time and effort in every aspect of the conference: inviting area chairs and program committee members; creating and managing the conference Web site; managing the review process of submitted papers; communicating with the authors and committee members; and editing the proceedings.

We would also recognize and appreciate the sponsorship provided by the IEEE Computer Society and BAIF.

Thank you for your participation, and hope that you will enjoy ICTAI 2023.

Best regards,

Anna Esposito
ICTAI 2023 General Chair

Message from the Program Chairs
ICTAI 2023

Dear ICTAI 2023 participants on the behalf of the organizing and program committees, I welcome you to the 35th IEEE International Conference on Tools with Artificial Intelligence (ICTAI 2023) held in Atlanta, GA, USA.

The ICTAI series is a very special high quality forum where researchers share knowledge in the field of Tools with Artificial Intelligence presenting their scientific achievements and the tools (architectures, languages and algorithms) they have developed for solving scientific and engineering problems.

As for any year, submissions have been solicited and received in the areas of AI Foundations; AI Domain-Specific Applications; AI Computing Systems; Machine Learning; Data Mining; Semantic Web, Reasoning; Intelligent Agents; AI based Decision Making, AI in Assistive Technologies, as well as, Constraint Solving Programming (CSP) and SAT-based technologies.

A total number of 408 submissions were received around of the world, all high quality papers. To this aims I want to thank contributors of both accepted and rejected papers. All strong and scientifically interesting projects were submitted. However, the acceptance threshold was set very high and therefore, only 35% of the submitted papers was included in the ICTAI 2015 proceedings. More specifically, there are two categories of accepted papers, full and short. The acceptance of the full papers was 21%.

The successful journey of ICTAI 2015 was due to the hard and voluntary work of many people. I am not reporting all of them, but I must mention some, because without their support and contribute I would have been lost.

First, we want to thanks the Steering committee chair, Professor Nikolaos Bourbakis, who was with us all the time, helping, providing precious suggestions and sharing with us his long time experience in running ICTAI as founder. we would have not made the conference without his practical and emotional support.

Following the ICTAI practice in supporting and granting students' participation in the conference, I am pleased to announce that ICTAI 2023 will acknowledge 5 best student paper awards based on the scores from the review process and their presentations in the conference. In addition, the Best Conference paper Award will given during the gala dinner.

The ICTAI Series build up its success on the work of people that year by year had contribute to made it a worldwide event. To this aim, we would like to express my deep appreciation to the ICTAI general chair, Professor ***Anna Esposito,*** for the support received in initiating this year event.

We would like to thank the Financial & Registration Chairs, **Michail Alexiou** and **Zhigang Li**, the Web Chair **Durga Narayana Varma Addepalli**, and the Publicity Chairs **Carmela Comito**, **Chloe Xie** and **Jian Yu**.

The revision process would have been not possible without the dedication of the ICTAI Area Chairs and the ICTAI Program Committee members, which are listed in the previous pages. we owe them for taking in charge the revisions during a deserved vacation period, for their accurate review work, and their valuable selection process.

Finally, we want to thanks the institutional sponsors: a) IEEE Computer Society, b) Biological & Artificial Intelligence Foundation (BAIF) for their support on this journey.

Most importantly, we are extremely grateful to the ICTAI 2023 contributors and keynote speakers whose work I hope will stimulate an interesting interaction among the ICTAI attendees, in order to make this event a scientifically stimulating gathering and a memorable personal experience.

We wish you an exciting and productive conference time.

Gennaro Cordasco
Ming Yang
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