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Preface

The MIWAI workshop series is an annual workshop that was started by the Mahasarakham University in Thailand in 2007 as the Mahasarakham International Workshop on Artificial Intelligence. It has progressively emerged as an international workshop with participants from around the world. Thus, in 2012, MIWAI was held in Ho Chi Minh City, Vietnam, and MIWAI 2013 was held in Krabi, Thailand.

Continuing its tradition, the MIWAI series of workshops offers a forum where artificial intelligence (AI) researchers and practitioners can discuss cutting-edge research ideas and present innovating research applications. It also strives to elevate the standards of AI research by providing researchers with feedback from an internationally renowned Program Committee.

AI is a broad research areas. Theory, methods, and tools in AI sub-areas such as cognitive science, computational philosophy, computational intelligence, game theory, multi-agent systems, machine learning, natural language, robotics, representation and reasoning, speech and vision, along with their diverse applications in domains including big data, biometrics, bio-informatics, decision-support systems, e-commerce, e-health, e-learning, knowledge management, privacy, recommender systems, security, software engineering, spam-filtering, or telecommunications, and Web services are topics of interest to MIWAI.

This year, MIWAI 2014 reflected this broad coverage as the submissions were wide ranging and covered both theory as well as applications. This volume contains the research papers presented at the 8th Multi-disciplinary International Workshop on Artificial Intelligence (MIWAI) held during December 8–10, 2014, in Bangalore, India.

MIWAI 2014 received 44 full papers from many countries including Algeria, Bangladesh, Canada, Germany, India, Korea, Morocco, Poland, UK, and Vietnam. Following the success of previous MIWAI conferences, MIWAI 2014 continued the tradition of a rigorous review process. All submissions were subject to a brief review by the program and general chairs to ensure a blind and fair review. Every submission was reviewed by at least two Program Committee members and domain experts. Additional reviews were sought when necessary. At the end, a total of 22 papers were accepted with an acceptance rate of 50%. Some of the papers that were excluded from the proceedings showed promise, but had to be rejected to maintain the quality of the proceedings. We would like to thank all authors for their submissions. Without their contribution, this workshop would not have been possible.

We are grateful to Prof. C. A. Murthy for accepting our invitation to deliver the keynote talk. Special thanks to all the invited speakers Prof. P.S. Sastry, Prof. B.S. Daya Sagar, Dr. Biplav Srivastava and the tutorial speakers Prof. P. Krishna Reddy and Dr. Chattrakul Sombattheera. We are indebted to the

Program Committee members and external reviewers for their effort in ensuring a rich scientific program.

We acknowledge the use of the EasyChair Conference System for the paper submission, review, and compilation of the proceedings. We are also thankful to all our sponsors: IBM India Pvt. Ltd, Institute for Development and Research in Banking Technology, Allied Telesis India Pvt. Ltd, Locuz Enterprise Solutions Ltd. Last but not the least our sincere thanks to Alfred Hofmann, Anna Kramer, and the excellent LNCS team at Springer for their support and cooperation in publishing the proceedings as a volume of the *Lecture Notes in Computer Science*.

September 2014

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Table of Contents