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Database Systems for Advanced Applications

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Proceedings, Part II

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Preface

DASFAA is an annual international database conference, which showcases state-of-the-art R&D activities in database systems and their applications. It provides a forum for technical presentations and discussions among database researchers, developers and users from academia, business and industry. It is our great pleasure to present you the proceedings of the 16th International Conference on Database Systems for Advanced Applications (DASFAA 2011), which was held in Hong Kong, China, during April 22-25, 2011.

DASFAA 2011 received 225 research paper submissions from 32 countries / regions (based on the affiliation of the first author). After a thorough review process for each submission by the Program Committee and specialists recommended by Program Committee members, DASFAA 2011 accepted 53 full research papers and 12 short research papers (the acceptance rates were 24% and 5%, respectively). Other papers in this volume include four industrial papers selected by a committee chaired by Takahiro Hara (Osaka University), Tengjiao Wang (Peking University), and Xing Xie (Microsoft Research China), and eight demo papers selected by a committee chaired by Jidong Chen (EMC Research China), Lei Chen (The Hong Kong University of Science and Technology), and Kyoung-Gu Woo (Samsung Electronics).

This volume also includes two invited keynote papers, presented by leading experts in database research and advanced applications at DASFAA 2011, Josephine M. Cheng (IBM Research Almaden Lab) and Divy Agrawal (University of California at Santa Barbara), on the topics of "Smarter Planet: Empower People with Information Insights" and "Database Scalability, Elasticity, and Autonomy in the Could," respectively; one extended abstract for the DASFAA 2011 ten-year best paper on "What Have We Learnt from Deductive Object-Oriented Database Research?" by Mengchi Liu (Carleton University), Gillian Dobbie (University of Auckland), and Tok Wang Ling (National University of Singapore); three tutorial abstracts, selected by Tutorial Co-chairs Reynold Cheng (The University of Hong Kong), Ken Lee (University of Massachusetts Dartmouth), and Ee-Peng Lim (Singapore Management University), "Managing Social Image Tags: Methods and Applications" by Aixin Sun and Sourav S. Bhowmick, "Searching, Analyzing and Exploring Databases" by Yi Chen, Wei Wang and Ziyang Liu, and "Web Search and Browse Log Mining: Challenges, Methods, and Applications" by Daxin Jiang; and one panel abstract selected by Panel Co-chairs, Haibo Hu (Hong Kong Baptist University), Haixun Wang (Microsoft Research China), and Baihua Zheng (Singapore Management University). The conference program boasts conference proceedings that span two volumes in Springer's *Lecture Notes in Computer Science* series.

Beyond the main conference, six workshops, held in conjunction with DASFAA 2011, were selected by Workshop Co-chairs Jianliang Xu (Hong Kong

Baptist University), Ge Yu (Northeastern University), and Shuigeng Zhou (Fudan University). They are the First International Workshop on Graph-structured Data Bases (GDB 2011), the First International Workshop on Spatial Information Modeling, Management and Mining (SIM3), the International Workshop on Flash-Based Database Systems (FlashDB), the Second International Workshop on Social Networks and Social Media Mining on the Web (SNSMW), the First International Workshop on Data Management for Emerging Network Infrastructures (DaMEN), and the 4th International Workshop on Data Quality in Integration Systems (DQIS). The workshop papers are included in a separate volume of proceedings also published by Springer in its *Lecture Notes in Computer Science* series.

DASFAA 2011 was jointly organized by The Chinese University of Hong Kong, The Hong Kong University of Science and Technology, Hong Kong Baptist University, The University of Hong Kong, City University of Hong Kong, and The Hong Kong Polytechnic University. It received in-cooperation sponsorship from the China Computer Federation Database Technical Committee. We are grateful to the sponsors who contributed generously to making DASFAA 2011 successful. They are the Department of Systems Engineering and Engineering Management of The Chinese University of Hong Kong, Oracle, IBM, K.C. Wong Education Foundation, and Hong Kong Pei Hua Education Foundation.

The conference would not have been possible without the support of many colleagues. We would like to express our special thanks to Honorary Conference Co-chairs, Xingui He (Peking University), Shan Wang (Renmin University of China), and Kyu-Young Whang (KAIST) for their valuable advice on all aspects of organizing the conference. We thank Organizing Committee Chair Kam-Fai Wong (The Chinese University of Hong Kong), Publicity Co-chairs, Raymond Wong (The Hong Kong University of Science and Technology), Xiaochun Yang (Northeastern University), and Xiaofang Zhou (University of Queensland), Publication Chair Rainer Unland (University of Duisburg-Essen), Finance Chair Vincent Ng (The Hong Kong Polytechnic University), Local Arrangements Chair Hongva Leong (The Hong Kong Polytechnic University), Sponsor Chair Joseph Ng (Hong Kong Baptist University), Best Award Committee Co-chairs Ming-Syan Chen (Academia Sinica, Taiwan and National Taiwan University) and Aoying Zhou (East China Normal University), and Demo Award Committee Co-chairs Ben Kao (The University of Hong Kong) and Lizhu Zhou (Tsinghua University). Our thanks go to all the committee members and other individuals involved in putting it all together, and all authors who submitted their papers to this conference.

July 2010

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