Communications in Computer and Information Science 957

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Knowledge Graph and Semantic Computing

Knowledge Computing and Language Understanding

Third China Conference, CCKS 2018 Tianjin, China, August 14–17, 2018 Revised Selected Papers



Editors Jun Zhao Institute of Automation Chinese Academy of Sciences Beijing, China

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Jie Tang Tsinghua University Beijing, China Xianpei Han Institute of Software Chinese Academy of Sciences Beijing, China

Quan Wang Institute of Information Engineering Chinese Academy of Sciences Beijing, China

Xianyong Li Xihua University Chendu, China

 ISSN 1865-0929
 ISSN 1865-0937 (electronic)

 Communications in Computer and Information Science
 ISBN 978-981-13-3145-9
 ISBN 978-981-13-3146-6 (eBook)

 https://doi.org/10.1007/978-981-13-3146-6
 ISBN 978-981-13-3146-6
 ISBN 978-981-13-3146-6

Library of Congress Control Number: 2018962353

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Preface

This volume contains the papers presented at CCKS 2018: the China Conference on Knowledge Graph and Semantic Computing held during August 14–17, 2018, in Tianjin.

CCKS is organized by the Technical Committee on Language and Knowledge Computing of the Chinese Information Processing Society (CIPS). CCKS 2018 was the third edition of the conference series, where the first edition was held in Beijing in 2016, and the second edition held in Chengdu in 2017. The first edition, CCKS 2016, was the merger of two premier relevant forums held previously: the Chinese Knowledge Graph Symposium (KGS) and the Chinese Semantic Web and Web Science Conference (CSWS). KGS was held in Beijing in 2013, in Nanjing in 2014, and in Yichang in 2015. CSWS was first held in Beijing in 2006, and has been the main forum for research on the Semantic (Web) technologies in China for nearly ten years. CCKS covers wide research fields including knowledge graph, the Semantic Web, linked data, NLP, knowledge representation, graph databases etc. It aims to be the top forum on knowledge graph and semantic technologies for Chinese researchers and practitioners from academia, industry, and government.

The theme of this year was "Knowledge Computing and Language Understanding." There were 101 submissions. Each submission was reviewed by at least two, and on average 3.1, Program Committee members. The committee decided to accept 29 full/short papers (including 15 papers written in English and 14 papers written in Chinese). The program also included four invited keynotes, six tutorials, four shared tasks, two industrial forums, and one panel. The CCKS volume contains revised versions of 12 full/short papers written in English. This year's invited talks were given by Prof. Bo Zhang from Tsinghua University, Prof. James A. Hendler from Rensselaer Polytechnic Institute, Dr. Hui Qiang from Alibaba, and Prof. Roberto Navigli from Sapienza University of Rome.

The hard work and close collaboration of a number of people contributed to the success of this conference. We would like to thank the members of the Organizing Committee and Program Committee for their support as well as the authors and participants, who are the primary reason of the success of this conference.

Finally, we appreciate the sponsorship from AISPEECH, LEGAL INTELLIGENCE, Meituan Dianping, WeBank, Alibaba Group, and GTCOM as platinum sponsors, Unisound, PING AN Healthcare Technology, yuri.ai, ChinaScope, and Alex & Masen as gold sponsors, PlantData, Credit Harmony Research, Xiaomi Inc., and YIDUCLOUD as silver sponsors, and SoftBank Robotics and MEMECT as bronze sponsors.

September 2018

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