# **International Journal of Web Services Research**

October-December 2015, Vol. 12, No. 4

# **Table of Contents**

# Special Issue on New Techniques of Services Computing

# GUEST EDITORIAL PREFACE

iv Jia Zhang, Carnegie Mellon University, Mountain View, CA, USA Hanhua Chen, Huazhong University of Science and Technology, Wuhan, China

# RESEARCH ARTICLES

An Advertiser-Centric Cooperative Mechanism in Smartphone Advertising Based on Stackelberg Game Analysis

Hong Yao, China University of Geosciences, Wuhan, China Guang Yang, China University of Geosciences, Wuhan, China Deze Zeng, China University of Geosciences, Wuhan, China Chao Liu, China University of Geosciences, Wuhan, China Qingzhong Liang, China University of Geosciences, Wuhan, China Chengyu Hu, China University of Geosciences, Wuhan, China

### 16 Individual Doctor Recommendation in Large Networks by Constrained Optimization

Jibing Gong, School of Information Science and Engineering, The Key Laboratory for Computer Virtual Technology and System Integration of Hebei Province, Yanshan University, Qinhuangdao, China

Hong Cheng, Department of Systems Engineering and Engineering Management, The Chinese University of Hong Kong, Hong Kong, China Lili Wang, School of Information Science and Engineering, The Key Laboratory for Computer Virtual Technology and System Integration of Hebei Province, Yanshan University, Qinhuangdao, China

### 29 Fairly Sharing the Network for Multitier Applications in Clouds

Xiaolin Xu, Huazhong University of Science and Technology, Wuhan, China Song Wu, Huazhong University of Science and Technology, Wuhan, China Hai Jin, Huazhong University of Science and Technology, Wuhan, China Chuxiong Yan, Huazhong University of Science and Technology, Wuhan, China

### 48 A Pagerank-Inspired Heuristic Scheme for Influence Maximization in Social Networks

Bo Zhang, Nanjing University of Posts and Telecommunications, Nanjing, China Yufeng Wang, Nanjing University of Posts and Telecommunications, Nanjing, China Qun Jin, China Jiliang University, Hangzhou, China & Waseda University, Tokyo, Japan Jianhua Ma, Hosei University, Tokyo, Japan

## Copyright

The International Journal of Web Services Research (IJWSR) (ISSN 1545-7362; eISSN 1546-5004), Copyright © 2015 IGI Global. All rights, including translation into other languages reserved by the publisher. No part of this journal may be reproduced or used in any form or by any means without written permission from the publisher, except for noncommercial, educational use including classroom teaching purposes. Product or company names used in this journal are for identification purposes only. Inclusion of the names of the products or companies does not indicate a claim of ownership by IGI Global of the trademark or registered trademark. The views expressed in this journal are those of the authors but not necessarily of IGI Global.

The International Journal of Web Services Research is indexed or listed in the following: ABI/Inform; ACM Digital Library; Bacon's Media Directory; Burrelle's Media Directory; Cabell's Directories; Compendex (Elsevier Engineering Index); CSA Illumina; Current Contents®/ Engineering, Computing, & Technology; DBLP; DEST Register of Refereed Journals; Gale Directory of Publications & Broadcast Media; GetCited; Google Scholar; INSPEC; Journal Citation Reports/Science Edition; JournalTOCs; Library & Information Science Abstracts (LISA); MediaFinder; Norwegian Social Science Data Services (NSD); PubList.com; Science Citation Index Expanded (SciSearch®); SCOPUS; The Index of Information Systems Journals; The Standard Periodical Directory; Thomson Reuters; Ulrich's Periodicals Directory; Web of Science