

# Contents

## Research Track

On the Marriage of SPARQL and Keywords . . . . .	3
<i>Peng Peng, Lei Zou, and Dongyan Zhao</i>	
An Online Inference Algorithm for Labeled Latent Dirichlet Allocation . . . . .	17
<i>Qiang Zhou, Heyan Huang, and Xian-Ling Mao</i>	
Efficient Buffer Management for PCM-Enhanced Hybrid Memory Architecture . . . . .	29
<i>Kaimeng Chen, Peiquan Jin, and Lihua Yue</i>	
Efficient Location-Dependent Skyline Queries in Wireless Broadcast Environments . . . . .	41
<i>Yingyuan Xiao, Pengqiang Ai, Hongya Wang, Ching-Hsien Hsu, and Wenxiang Cui</i>	
Distance and Friendship: A Distance-Based Model for Link Prediction in Social Networks . . . . .	55
<i>Yang Zhang and Jun Pang</i>	
Multi-Label Emotion Tagging for Online News by Supervised Topic Model . . . . .	67
<i>Ying Zhang, Lili Su, Zhifan Yang, Xue Zhao, and Xiaojie Yuan</i>	
Distinguishing Specific and Daily Topics . . . . .	80
<i>Tao Ge, Wenzhe Pei, Baobao Chang, and Zhifang Sui</i>	
Matching Reviews to Object Based on 2-Stage CRF . . . . .	92
<i>Zhang Yongxin, Li Qingzhong, Wang Dequan, Ding Yanhui, Liu Congli, and Yan Zhongmin</i>	
Discovering Restricted Regular Expressions with Interleaving . . . . .	104
<i>Feifei Peng and Haiming Chen</i>	
Efficient Algorithms for Distance-Based Representative Skyline Computation in 2D Space . . . . .	116
<i>Taotao Cai, Rong-Hua Li, Jeffrey Xu Yu, Rui Mao, and Yadi Cai</i>	
Trustworthy Collaborative Filtering through Downweighting Noise and Redundancy . . . . .	129
<i>Qiuixiang Dong, Zhi Guan, and Zhong Chen</i>	

A Co-ranking Framework to Select Optimal Seed Set for Influence Maximization in Heterogeneous Network .....	141
<i>Yashen Wang, Heyan Huang, Chong Feng, and Xianxiang Yang</i>	
Hashtag Sense Induction Based on Co-occurrence Graphs .....	154
<i>Mengmeng Wang and Mizuho Iwaihara</i>	
Hybrid-LSH for Spatio-Textual Similarity Queries .....	166
<i>Mingdong Zhu, Derong Shen, Ling Liu, and Ge Yu</i>	
Sleep Quality Evaluation of Active Microblog Users .....	178
<i>Kai Wu, Jun Ma, Zhumin Chen, and Pengjie Ren</i>	
An Ensemble Matchers Based Rank Aggregation Method for Taxonomy Matching .....	190
<i>Hailun Lin, Yuanzhuo Wang, Yantao Jia, Jinhua Xiong, Peng Zhang, and Xueqi Cheng</i>	
Distributed XML Twig Query Processing Using MapReduce.....	203
<i>Xin Bi, Guoren Wang, Xiangguo Zhao, Zhen Zhang, and Shuang Chen</i>	
Sentiment Word Identification with Sentiment Contextual Factors.....	215
<i>Jiguang Liang, Xiaofei Zhou, Yue Hu, Li Guo, and Shuo Bai</i>	
Large-Scale Graph Classification Based on Evolutionary Computation with MapReduce.....	227
<i>Zhanghui Wang, Yuhai Zhao, Guoren Wang, and Yurong Cheng</i>	
Multiple Attribute Aware Personalized Ranking .....	244
<i>Weiyu Guo, Shu Wu, Liang Wang, and Tieniu Tan</i>	
Knowledge Base Completion Using Matrix Factorization .....	256
<i>Wenqiang He, Yansong Feng, Lei Zou, and Dongyan Zhao</i>	
MATAR: Keywords Enhanced Multi-label Learning for Tag Recommendation .....	268
<i>Licheng Li, Yuan Yao, Feng Xu, and Jian Lu</i>	
Reverse Direction-Based Surrounding Queries .....	280
<i>Xi Guo, Yoshiharu Ishikawa, Aziguli Wulamu, and Yonghong Xie</i>	
Learning to Hash for Recommendation with Tensor Data .....	292
<i>Qiyue Yin, Shu Wu, and Liang Wang</i>	
Spare Part Demand Prediction Based on Context-Aware Matrix Factorization .....	304
<i>Jianwei Ding, Yingbo Liu, Yuan Cao, Li Zhang, and Jianmin Wang</i>	

Location Sensitive Friend Recommendation in Social Network .....	316
<i>Xueqin Sui, Zhumin Chen, and Jun Ma</i>	
A Compression-Based Filtering Mechanism in Content-Based Publish/Subscribe System.....	328
<i>Qin Liu, Yiwen Zheng, and Kaile Wang</i>	
Sentiment Classification for Chinese Product Reviews Based on Semantic Relevance of Phrase .....	340
<i>Heng Chen, Hai Jin, Pingpeng Yuan, Lei Zhu, and Hang Zhu</i>	
Overlapping Schema Summarization Based on Multi-label Propagation .....	352
<i>Man Yu, Chao Wang, Xiangrui Cai, Ying Zhang, Yanlong Wen, and Xiaojie Yuan</i>	
Analysis of Subjective City Happiness Index Based on Large Scale Microblog Data .....	365
<i>Kai Wu, Jun Ma, Zhumin Chen, and Pengjie Ren</i>	
Tree-Based Metric Learning for Distance Computation in Data Mining .....	377
<i>Ming Yan, Yan Zhang, and Hongzhi Wang</i>	
GSCS – Graph Stream Classification with Side Information .....	389
<i>Amit Mandal, Mehedi Hasan, Anna Fariha, and Chowdhury Farhan Ahmed</i>	
A Supervised Parameter Estimation Method of LDA .....	401
<i>Liu Zhenyan, Meng Dan, Wang Weiping, and Zhang Chunxia</i>	
Learning Similarity Functions for Urban Events Detection by Mining Hotline Phone Records .....	411
<i>Pengjie Ren, Peng Liu, Zhumin Chen, Jun Ma, and Xiaomeng Song</i>	
Answering Spatial Approximate Keyword Queries in Disks .....	424
<i>Jinbao Wang, Donghua Yang, Yuhong Wei, Hong Gao, Jianzhong Li, and Ye Yuan</i>	
Hashing Multi-Instance Data from Bag and Instance Level .....	437
<i>Yao Yang, Xin-Shun Xu, Xiaolin Wang, Shanqing Guo, and Lizhen Cui</i>	
A Multi-news Timeline Summarization Algorithm Based on Aging Theory .....	449
<i>Jie Chen, Zhendong Niu, and Hongping Fu</i>	
Extended Strategies for Document Clustering with Word Co-occurrences .....	461
<i>Yang Wei, Jinmao Wei, and Zhenglu Yang</i>	

A Lightweight Evaluation Framework for Table Layouts in MapReduce Based Query Systems .....	473
<i>Feng Zhu, Jie Liu, Lijie Xu, Dan Ye, Jun Wei, and Tao Huang</i>	
An Extended Graph-Based Label Propagation Method for Readability Assessment.....	485
<i>Zhiwei Jiang, Gang Sun, Qing Gu, Lixia Yu, and Daoxu Chen</i>	
Simple is Beautiful: An Online Collaborative Filtering Recommendation Solution with Higher Accuracy .....	497
<i>Feng Zhang, Ti Gong, Victor E. Lee, Gansen Zhao, and Guangzhi Qu</i>	
Random-Based Algorithm for Efficient Entity Matching.....	509
<i>Pingfu Chao, Zhu Gao, Yuming Li, Junhua Fang, Rong Zhang, and Aoying Zhou</i>	
A New Similarity Measure Between Semantic Trajectories Based on Road Networks .....	522
<i>Xia Wu, Yuanyuan Zhu, Shengchao Xiong, Yuwei Peng, and Zhiyong Peng</i>	
Effective Citation Recommendation by Unbiased Reference Priority Recognition .....	536
<i>Wen-Yang Lu, Yu-Bin Yang, Xiao-Jiao Mao, and Qi-Hai Zhu</i>	
UserGreedy: Exploiting the Activation Set to Solve Influence Maximization Problem .....	548
<i>Wenxin Liang, Chengguang Shen, and Xianchao Zhang</i>	
AILabel: A Fast Interval Labeling Approach for Reachability Query on Very Large Graphs .....	560
<i>Feng Shuo, Xie Ning, Shen de-Rong, Li Nuo, Kou Yue, and Yu Ge</i>	
Graph-Based Hybrid Recommendation Using Random Walk and Topic Modeling .....	573
<i>Hai-Tao Zheng, Yang-Hui Yan, and Ying-Min Zhou</i>	
RDQS: A Relevant and Diverse Query Suggestion Generation Framework.....	586
<i>Hai-Tao Zheng and Yi-Chi Zhang</i>	
Minimizing the Cost to Win Competition in Social Network .....	598
<i>Ziyan Liu, Xiaoguang Hong, Zhaohui Peng, Zhiyong Chen, Weibo Wang, and Tianhang Song</i>	
Ad Dissemination Game in Ephemeral Networks .....	610
<i>Lihua Yin, Yunchuan Guo, Yanwei Sun, Junyan Qian, and Athanasios Vasilakos</i>	

User Generated Content Oriented Chinese Taxonomy Construction . . . . .	623
<i>Jinyang Li, Chengyu Wang, Xiaofeng He, Rong Zhang, and Ming Gao</i>	
Mining Weighted Frequent Itemsets with the Recency Constraint . . . . .	635
<i>Jerry Chun-Wei Lin, Wensheng Gan, Philippe Fournier-Viger, and Tzung-Pei Hong</i>	
Boosting Explicit Semantic Analysis by Clustering Paragraph Vectors of Wikipedia Articles . . . . .	647
<i>Hai-Tao Zheng and Wenzhen Wu</i>	
Research on Semantic Disambiguation in Treebank . . . . .	658
<i>Lin Miao, Xueqiang Lv, Yunfang Wu, and Yue Wang</i>	
PDMA: A Probabilistic Framework for Diversifying Recommendation Lists . . . . .	670
<i>Yang-Hui Yan, Ying-Min Zhou, and Hai-Tao Zheng</i>	
User Behavioral Context-Aware Service Recommendation for Personalized Mashups in Pervasive Environments . . . . .	683
<i>Wei He, Guozhen Ren, Lizhen Cui, and Hui Li</i>	
On Coherent Indented Tree Visualization of RDF Graphs . . . . .	695
<i>Qingxia Liu, Gong Cheng, and Yuzhong Qu</i>	
Online Feature Selection Based on Passive-Aggressive Algorithm with Retaining Features . . . . .	707
<i>Hai-Tao Zheng and Haiyang Zhang</i>	
Online Personalized Recommendation Based on Streaming Implicit User Feedback . . . . .	720
<i>Zhisheng Wang, Qi Li, Ye Liu, Wei Liu, and Jian Yin</i>	
A Self-learning Rule-Based Approach for Sci-tech Compound Phrase Entity Recognition . . . . .	732
<i>Tingwen Liu, Yang Zhang, Yang Yan, Jinqiao Shi, and Li Guo</i>	
Batch Mode Active Learning for Geographical Image Classification . . . . .	744
<i>Zengmao Wang, Bo Du, Lefei Zhang, Wenbin Hu, Dacheng Tao, and Liangpei Zhang</i>	
A Multi-view Retweeting Behaviors Prediction in Social Networks . . . . .	756
<i>Bo Jiang, Ying Sha, and Lihong Wang</i>	
Probabilistic Frequent Pattern Mining by PUH-Mine . . . . .	768
<i>Wenzhu Tong, Carson K. Leung, Dacheng Liu, and Jialiang Yu</i>	

A Secure and Efficient Framework for Privacy Preserving Social Recommendation ..... 781  
*Shushu Liu, An Liu, Guanfeng Liu, Zhixu Li, Jiajie Xu, Pengpeng Zhao, and Lei Zhao*

DistDL: A Distributed Deep Learning Service Schema with GPU Accelerating ..... 793  
*Jianzong Wang and Lianglun Cheng*

A Semi-supervised Solution for Cold Start Issue on Recommender Systems ..... 805  
*Zhifeng Hao, Yingchao Cheng, Ruichu Cai, Wen Wen, and Lijuan Wang*

**Industry Track**

Hybrid Cloud Deployment of an ERP-Based Student Administration System ..... 821  
*Simon K.S. Cheung*

A Benchmark Evaluation of Enterprise Cloud Infrastructure ..... 832  
*Yong Chen, Xuanzhong Xie, and Jiayin Wu*

A Fast Data Ingestion and Indexing Scheme for Real-Time Log Analytics ..... 841  
*Haoqiong Bian, Yueguo Chen, Xiongpai Qin, and Xiaoyong Du*

**Demonstration Track**

A Fair Data Market System with Data Quality Evaluation and Repairing Recommendation ..... 855  
*Xiaodu Ding, Hongzhi Wang, Dan Zhang, Jianzhong Li, and Hong Gao*

HouseIn: A Housing Rental Platform with Non-redundant Information Integrated from Multiple Sources ..... 859  
*Jian Zhou, Zhixu Li, Qiang Yang, Jun Jiang, Jia Zhu, An Liu, Guanfeng Liu, and Lei Zhao*

ONCAPS: An Ontology-Based Car Purchase Guiding System ..... 863  
*Jianfeng Du, Jun Zhao, Jiayi Cheng, Qingchao Su, and Jiacheng Liang*

A Multiple Trust Paths Selection Tool in Contextual Online Social Networks ..... 867  
*Linlin Ma, Guanfeng Liu, Guohao Sun, Lei Li, Zhixu Li, An Liu, and Lei Zhao*

EPEMS: An Entity Matching System for E-Commerce Products . . . . .	871
<i>Lei Gao, Pengpeng Zhao, Victor S. Sheng, Zhixu Li, An Liu, Jian Wu, and Zhiming Cui</i>	
PPS-POI-Rec: A Privacy Preserving Social Point-of-Interest Recommender System . . . . .	875
<i>Xiao Liu, An Liu, Guanfeng Liu, Zhixu Li, Jiajie Xu, Pengpeng Zhao, and Lei Zhao</i>	
Incorporating Contextual Information into a Mobile Advertisement Recommender System . . . . .	879
<i>Ke Zhu, Yingyuan Xiao, Pengqiang Ai, Hongya Wang, and Ching-Hsien Hsu</i>	
<b>Author Index . . . . .</b>	<b>883</b>

Web Technologies and Applications

17th Asia-Pacific Web Conference, APWeb 2015,

Guangzhou, China, September 18-20, 2015,

Proceedings

Cheng, R.; Cui, B.; Zhang, Z.; Cai, R.; Xu, J. (Eds.)

2015, XIX, 885 p. 330 illus., Softcover

ISBN: 978-3-319-25254-4