Contents

Invited Papers

Enterprise Ontology and DEMO Benefits, Core Concepts and a Case Study . . . 3
David Aveiro

Mastering Data-Intensive Collaboration and Decision Making:
The Dicode Project . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 21
Nikos Karacapilidis

Knowledge Discovery and Information Retrieval

Integration of Text Mining Taxonomies . . . . . . . . . . . . . . . . . . . . . . . . . . . 39
Katja Pfeifer and Eric Peukert

A Multi-dimensional Model for Computer-Aided Measuring
Planning (CAMP) in Digital Manufacturing . . . . . . . . . . . . . . . . . . . . . . . . . 56
Xiaoqing Tang and Zhehan Chen

The Application of Support Vector Machine and Behavior Knowledge Space
in the Disulfide Connectivity Prediction Problem . . . . . . . . . . . . . . . . . . . . . 66
Hong-Yu Chen, Kuo-Tsung Tseng, Chang-Biau Yang, and Chiou-Yi Hor

Two-Tier Machine Learning Using Conditional Random Fields
with Constraints . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 80
Sebastian Lindner

Keyword Extraction from Company Websites for the Development
of Regional Knowledge Maps. . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . . 96
Christian Wartena and Montserrat Garcia-Alsina

Knowledge Engineering and Ontology Development

Pitfalls in Ontologies and TIPS to Prevent Them. . . . . . . . . . . . . . . . . . . . . . 115
C. Maria Keet, Mari Carmen Suárez-Figueroa, and María Poveda-Villalón

Foundational Ontology Mediation in ROMULUS . . . . . . . . . . . . . . . . . . . . . 132
Zubeida C. Khan and C. Maria Keet

PRONTOE: An Ontology Editor for Domain Experts . . . . . . . . . . . . . . . . . . . 153
Scott Bell, Pete Bonasso, Mark Boddy, David Kortenkamp, and Debra Schreckenghost
Methodology to Develop Ontological Building Information Model for Energy Management System in Building Operational Phase .......................... 168
Hendro Wicaksono, Preslava Dobreva, Polina Häfner, and Sven Rogalski

Combining Ontological and Qualitative Spatial Reasoning: Application to Urban Images Interpretation .............................................................. 182
François de Bertrand de Beuvron, Stella Marc-Zwecker, Cecilia Zanni-Merk, and Florence Le Ber

Design Patterns for Description-Logic Programs ........................................ 199
L. Cruz-Filipe, G. Gaspar, and I. Nunes

Integration of and a Solution for Proof Problems and Query-Answering Problems .......................................................... 215
Kiyoshi Akama and Ekawit Nantajeeewarawat

The Web Knowledge Management: A Taxonomy-Based Approach ............. 230
Filippo Eros Pani, Maria Ilaria Lunesu, Giulio Concas, and Gavina Baralla

Chunking Complexity Measurement for Requirements Quality Knowledge Representation .................................................. 245
David C. Rine and Anabel Fraga

KODEGEN: A Code Generation and Testing Tool Using Runnable Knowledge .......................................................... 260
Iaakov Exman, Anton Litovka, and Reuven Yagel

Using Context for Search, Browse and Recommendation in Software Development .................................. 276
Paulo Gomes, Bruno Antunes, and Bárbara Furtado

Knowledge Management and Information Sharing

ESA Knowledge Management Agenda ...................................................... 293
Roberta Mugellesi Dow, Damiano Guerrucci, Raul Cano Argamasilla, Diogo Bernardino, and Siegmar Pallaschke

Multilevel Self-organization in Smart Environment: Approach and Major Technologies .................................................. 311
Alexander Smirnov, Nikolay Shilov, and Alexey Kashevnik

Mitigating Barriers to Healthcare Knowledge Sharing in the Collaboration of Traditional and Western Practitioners in Chinese Hospitals .................................................. 326
Lihong Zhou and Miguel Baptista Nunes
A Risk Diagnosing Methodology Web-Based Platform for Micro, Small and Medium Businesses: Remarks and Enhancements .......................... 340
Luís Pereira, Alexandra Tenera, João Bispo, and João Wemans

Elucidating Multi-disciplinary and Inter-agency Collaboration Process for Coordinated Elderly Care: A Case Study of a Japanese Care Access Center ................................................................. 357
Miki Saijo, Tsutomu Suzuki, Makiko Watanabe, and Shishin Kawamoto

Semiotics in Interoperation for Information Systems Working Collaboratively ......................................................... 370
Weizi Li, Kecheng Liu, and Shixiong Liu

Challenges to Construct Regional Knowledge Maps for Territories’ Sustainable Development ......................................................... 387
Montserrat Garcia-Alsina, Christian Wartena, and Sönke Lieberam-Schmidt

Exposition of Internal Factors Enhancing Creativity and Knowledge Creation ......................................................... 400
Lina Girdauskiene and Asta Savaneviciene

Cloud Security Assessment: Practical Method for Organization’s Assets Migration to the Cloud ......................................................... 411
Ronivon Costa and Carlos Serrão

Author Index ................................................................. 425
Knowledge Discovery, Knowledge Engineering and Knowledge Management
5th International Joint Conference, IC3K 2013, Vilamoura, Portugal, September 19-22, 2013. Revised Selected Papers
Fred, A.; Dietz, J.L.G.; Liu, K.; Filipe, J. (Eds.)
2015, XVII, 425 p. 150 illus., Softcover
ISBN: 978-3-662-46548-6