

1 Conference Timetable

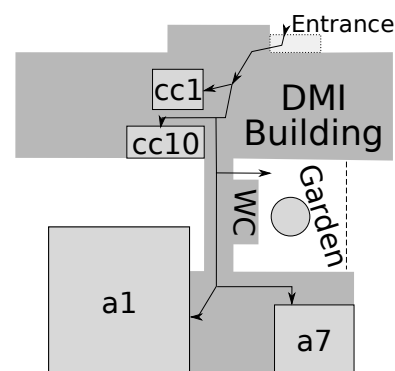
The changes compared to the "Abstracts and program" booklet are marked with strikethru and "++".
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1.1 Overview

Full papers have 25 minutes for presentations, while short papers have 15 minutes.

Lecture halls (all on the ground floor of the Department of Mathematics and Informatics – DMI): *a1* – Amphitheater 1, *a7* – Amphitheater 7, *cc1* – Computer Center 1, *cc10* – Computer Center 10.

16/09/2012	
10:30 – 11:00	<i>a1</i> : CLoBL <i>cc10</i> : SQAMIA
11:30 – 13:00	<i>a1</i> : CLoBL <i>cc10</i> : SQAMIA
13:00 – 14:30	– Lunch break –
14:30 – 16:00	<i>a1</i> : CA1 <i>cc10</i> : SQAMIA
16:00 – 16:30	– coffee break –
16:30 – 18:30	<i>a1</i> : AI1 <i>cc10</i> : ISR1
Reception	



17/09/2012		18/09/2012
09:00 – 09:30 Official Conference Opening		
09:30 – 10:15	<i>a1</i> : Mauro Pezze	<i>a1</i> : Bela Stantic
10:15 – 11:00	<i>a1</i> : Hussein Zedan	<i>a1</i> : Hans-Dieter Burkhard
10:45 – 11:15		– coffee break –
11:30 – 13:00	<i>a1</i> : SE1 <i>cc10</i> : AA	<i>a1</i> : AI3 <i>cc10</i> : OS1
13:00 – 14:30		– Lunch break –
14:30 – 16:00	<i>a1</i> : SE2 <i>cc10</i> : CA2	<i>a7</i> : TUT <i>cc10</i> : ISR2 Steering Committee
16:00 – 16:30		– coffee break –
16:30 – 18:30	<i>a1</i> : LT <i>cc10</i> : AI2	<i>a7</i> : TUT <i>cc10</i> : DIS2
City Tour		Dinner

19/09/2012	
09:00 – 09:45	<i>a1</i> : Klaus Bothe <i>cc10</i> : WASA
09:45 – 10:30	<i>a1</i> : Vladan Devedžić <i>cc10</i> : WASA
10:30 – 11:00	– coffee break –
11:00 – 12:30	<i>a1</i> : CA3 <i>cc1</i> : DIS2 <i>cc10</i> : WASA
Excursion	

1.2 Saturday, September 15

17:00 – 19:30 Registration, in front of Hall I

1.3 Sunday, September 16

- 09:00 – 14:00 Registration, in front of Hall I
- 10:30 – 13:00 **Workshop: Computational Linguistics and Natural Language Processing of Balkan Languages (CLOBL)** *a1*
Session Chair: Cvetana Krstev and Katerina Zdravkova
- Serbian Text Categorization Using Byte Level n-Grams
Jelena Graovac
 - Information Extraction from the Weather Reports in Serbian
Staša Vujičić Stanković and Vesna Pajić
 - Automatic Recognition of Composite Verb Forms in Serbian
Bojana Đorđević
 - Recognition and Normalization of Temporal Expressions in Serbian Texts
Jelena Jaćimović
 - An Approach to Development of Bilingual Lexical Resources
Ranka Stanković, Ivan Obradović and Aleksandra Trtovac
 - An Authorship Attribution for Serbian
Anđelka Zečević and Miloš Utvić
- 10:30 – 11:30++ **Workshop: Software Quality Analysis, Monitoring, Improvement, and Applications, (SQAMIA) – Special Session** *cc10*
Session Chair: Zoran Budimac
- ++ ◦ Studying Software Evolution Using Artefacts' Shared Information Content
Tom Arbuckle
- 11:30 – 13:00 **Workshop: Software Quality Analysis, Monitoring, Improvement, and Applications, (SQAMIA) – Session 1** *cc10*
Session Chair: Marjan Heričko and Zoran Budimac
- Adoption of object-oriented software metrics for ontology evaluation
Rok Žontar, Marjan Heričko
 - Agile Software Testing Technologies in a Large Scale Project
Bojana Koteska, Anastas Mishev
 - Rule-Based Assignment of Comments to AST Nodes in C++ programs
Tamás Cséri, Zsolt Szűgyi, Zoltán Porkoláb
 - ISO Software Quality Standards and Certification
Bisera Dugalic, Anastas Mishev
- 13:00 – 14:30 Lunch break
- 14:30 – 16:00 **Workshop: Software Quality Analysis, Monitoring, Improvement, and Applications, (SQAMIA) – Session 2** *cc10*
Session Chair: Hannu Jaakkola and Zoran Budimac
- Analyzing Structural Software Changes: A Case Study
Črt Gerlec, Marjan Heričko
 - Security Analysis Regarding Cross-Site Scripting on Internet Explorer
Adriana Neagoș and Simona Motogna
 - SSQSA architecture
Zoran Budimac, Gordana Rakić, Miloš Savić
 - Notes on the Parallels Between Biological and Software Evolution
Ladislav Samuelis
- 14:30 – 16:00 **CA1: Computer Applications in ...** *a1*
Session Chair: Sonja Ristić
- ~~... Society~~
- ~~Risks affecting the development of the information society in the Republic of Moldova: insights from a Delphi survey~~
~~(full) Horatiu Dragomirescu and Ion Tighineanu~~

... Business

- A Software Tool for Building a Statistical Prefix Processor
(full) Nikitas Karanikolas, Michael Vassilakopoulos and Nektarios Giannoulis
- Social Networking Software use in Social Media Marketing vs. Traditional Marketing: Case Study in Macedonia
(short) Bekim Fetaji and Amir Demiri

... Government

- Framework for Open Data Mining in e-Government
(short) Petar Milić, Nataša Veljković and Leonid Stoimenov

... Medicine

- Extracting Drug Adverse and Beneficial Reactions in Pediatric Population from Healthcare Social Network
(short) Jelena Hadzi-Puric and Jeca Grmusa

16:00 – 16:30

Coffee break

16:30 – 18:00 **AI1: Artificial Intelligence**

a1

Session Chair: Vladimir Kurbalija

- OECEP: Enriching Complex Event Processing with Domain Knowledge from Ontologies
(full) Sebastian Binnewies and Bela Stantic
- A distributed asynchronous and privacy preserving neural network ensemble selection approach for peer-to-peer data mining
(full) Yiannis Kokkinos and Konstantinos G. Margaritis
- An Approach to Automated Reparation of Failed Proof Attempts in Propositional Linear Logic Sequent Calculus
(full) Tatjana Lutovac

16:30 – 18:00 **ISR1: Information Storage and Retrieval and**

cc10

Session Chair: Miloš Radovanović

- Efficient dataset size reduction by finding homogeneous clusters
(full) Stefanos Ougiaroglou and Georgios Evangelidis
- Discovery and Evaluation of Students' Profiles with Machine Learning
(full) Evis Trandafili, Alban Allkoçi, Elinda Kajo and Aleksandër Xhuvani
- Comparison of Information Retrieval Models for Question Answering
(full) Jasmina Armenska and Katerina Zdravkova

Computer Graphics

- A Novel Algorithm for an Image Processing System in Entomology
(full) Marjan Kindalov, Ana Madevska-Bogdanova and Zarko Erakovic
- The Teaching of Geography using Dynamic Geometry
(short) Đorđe Herceg, Vera Herceg-Mandić and Davorka Radaković

19:15 – 21:15

Welcome Reception

1.4 Monday, September 17

09:00 – 14:00	Registration, in front of Hall I	
09:00 – 09:30	Official conference opening	
09:30 – 10:15	Invited Lecture 1	a1
	Session Chair: <i>Mirjana Ivanović</i>	
	o From Off-line to Continuous On-line Maintenance	
	<i>Mauro Pezzè</i>	
10:15 – 11:00	Invited Lecture 2	a1
	Session Chair: <i>Zoran Budimac</i>	
	o Secure and Context-Aware Workflow System	
	<i>Hussein Zedan</i>	
11:00 – 11:30	Coffee break	
11:30 – 13:00	SE1: Software Engineering	a1
	Session Chair: <i>Ivan Luković</i>	
	o Formal Modelling of a Bio-Inspired Paradigm Capable of Exhibiting Emergence	
	(full) <i>Konstantinos Rousis, George Eleftherakis, Ognjen Paunovski and Tony Cowling</i>	
	o Community Detection and Analysis of Community Evolution in Apache Ant Class Collaboration Networks	
	(full) <i>Miloš Savić, Miloš Radovanović and Mirjana Ivanović</i>	
	o Statically Typed Matrix	
	(full) <i>Predrag S. Rakić, Lazar Stričević and Zorica Suvajdžin Rakić</i>	
	o An Evaluation of Java Code Coverage Testing Tools	
	(short) <i>Elinda Kajo-Mece and Megi Tartari</i>	
11:30 – 13:00	AA: Analysis of Algorithms and Problem Complexity	cc10
	Session Chair: <i>Mirjana Ivanović</i>	
	o Virtualized Environments in Cloud Can Have Superlinear Speedup	
	(full) <i>Sasko Ristov, Marjan Gusev, Magdalena Kostoska and Kiril Kirovski</i>	
	o Comparative Performance Evaluation of The AVL and Red-black Trees	
	(full) <i>Svetlana Štrbac-Savić and Milo Tomašević</i>	
	o The Evaluation of Performance in Flow Label and Non-Flow Label Approach Based on IPv6 Technology	
	(short) <i>Ariana Bejleri, Igli Tafaj, Ermal Beqiri, Julian Fejzaj and Aleksander Biberaj</i>	
	o Logical Representation of Dependencies of Items and The Complexity of Customer Sets	
	(short) <i>János Demetrovics, Hua Nam Son and Ákos Gubán</i>	
13:00 – 14:30	Lunch break	
14:30 – 16:00	SE2: Software Engineering	a1
	Session Chair: <i>George Eleftherakis</i>	
	o Evaluation of Tools for Automated Unit Testing for Applications in OSGi	
	(short) <i>František Geletka, Ladislav Samuelis, and Jozef Vojtko</i>	
	o A Hoare-Style Verification Calculus for Control State ASMs	
	(short) <i>Werner Gabrisch and Wolf Zimmermann</i>	
	o Communication in Machine-to-Machine Environments	
	(short) <i>Iva Bojic, Mario Kusek, Gordan Jezic, Sasa Desic and Darko Huljenic</i>	
	o User-Friendly Menu for New-Age Mobile Phones	
	(short) <i>Ivan Peric and Oliver Sipos</i>	
	o Layout Proposal for One-Handed Device Interface	
	(short) <i>Oliver Sipos, Ivan Peric and Dragan Ivetic</i>	
14:30 – 16:00	CA2: Computer Applications in ...	cc10
	Session Chair: <i>Stelios Xinogalos</i>	

... Business

- Management, Communications and Security Policy in Mobile Database Systems
(full) *Vigan Raça, Betim Çiço and Majlinda Fetaji*
- Analyzing the Selection and Dynamic Composition of Web Services in E-commerce Transactions
(full) *Nikolaos Vesyropoulos and Christos K. Georgiadis*
- An Approach to the Specification of User Interface Templates for Business Applications
(full) *Sonja Ristić, Ivan Luković, Slavica Aleksić, Jelena Banović and Ali Al-Dahoud*

... Education

- A Software Tool that Helps Teachers in Handling, Processing and Understanding the Results of Massive Exams
(short) *Marko Mišić, Marko Lazić and Jelica Protić*

16:00 – 16:30 Coffee break

16:30 – 18:30 **LT: Languages and Techniques**

a1

Session Chair: *Zoran Budimac*

- Parameterized Verification of Open Procedural Programs
(full) *Aleksandar Dimovski*
- ~~Performance Study of Matrix Computations using Multi-core Programming Tools~~
(full) ~~*Panagiotis Michailidis and Konstantinos G. Margaritis*~~
- Recent Advances Delivered by HTML 5 in Mobile Cloud Computing Applications: A Survey
(full) *Stelios Xinogalos, Kostas E. Psannis and Angelo Sifaleras*
- Fuzzy XML with Implementation
(short) *Goran Panić, Miloš Racković and Srđan Škrbić*
- ~~Protection of Web Applications Using Aspect Oriented Programming and Performance Evaluation~~
(short) ~~*Elinda Kajo-Mece, Lorena Kodra, Enid Vrenozi and Bojken Shehu*~~

Computer Graphics (+)

- + + ○ A Novel Algorithm for an Image Processing System in Entomology
(full) *Marjan Kindalov, Ana Madevska Bogdanova and Zarko Erakovic*

16:30 – 18:30 **AI2: Networks and**

cc10

Session Chair: *Petros Kefalas*

- + + ○ Implementation and Evaluation of a Sleep-Proxy for Energy Savings in Networked Computers
(short) *Enida Sheme, Marin Aranitasi and Neki Frasheri*

Artificial Intelligence

- A Knowledge Based Approach for Handling Risk Management
(full) *Adrian Solomon, Panayiotis Ketikidis and Alok Choudhary*
- Recognition and Normalization of Some Classes of Named Entities in Serbian
(full) *Cvetana Krstev, Jelena Jaćimović and Duško Vitas*
- Optimising Flash Non-Volatile Memory using Machine Learning: A Project Overview
(short) *Tom Arbuckle, Damien Hogan and Conor Ryan*
- The Modification of Genetic Algorithms for Solving the Balanced Location Problem
(short) *Vladimir Filipović, Jozef Kratica, Aleksandar Savić and Đorđe Dugošija*

Computer Application in Education

- ~~<L|ETAP>~~ Model for an Adaptive Tutoring System
(short) *Eugenia Kovatcheva*

19:00 City tour

1.5 Tuesday, September 18

09:00 – 14:00	Registration, in front of Hall I	
09:30 – 10:15	Invited Lecture 3	a1
	Session Chair: <i>Mirjana Ivanović</i>	
	◦ An Implicit Approach to Deal with Periodically Repeated Data <i>Bela Stantic</i>	
10:15 – 11:00	Invited Lecture 4	a1
	Session Chair: <i>Zoran Budimac</i>	
	◦ Soccer Playing Robots for (e-)Learning <i>Hans-Dieter Burkhard</i>	
10:30 – 10:45+	BCI 2013, Announcement and presentation	a1
11:00 – 11:30	Coffee break	
11:30 – 13:00	AI3: Artificial Intelligence	a1
	Session Chair: <i>Hans-Dieter Burkhard</i>	
	◦ Formal Modelling of Agents acting under Artificial Emotions <i>(full) Petros Kefalas, Ioanna Stamatopoulou and Dionysis Basakos</i>	
	◦ Time Series Mining in a Psychological Domain <i>(full) Vladimir Kurbalija, Hans-Dieter Burkhard, Mirjana Ivanović, Charlotte Meyer, Jens Nachtwei and Lidija Fodor</i>	
	◦ Predictive Complex Event Processing: A Conceptual Framework for Combining Complex Event Processing and Predictive Analytics <i>(full) Lajos Jenő Fülöp, Gabriella Tóth, László Vidács, Árpád Beszédes, Hunor Demeter, Lóránt Farkas, Tibor Gyimothy and Gergő Balogh</i>	
	◦ Reservoir Sampling Techniques in Modern Data Analysis <i>(short) Anže Pečar, Miha Zidar and Matjaž Kukar</i>	
11:30 – 13:00	OS1: Operating Systems and	cc10
	Session Chair: <i>Marjan Gusev Betim-Çiço</i>	
	◦ A Parallel Processing of Spatial Data Interpolation on Computing Cloud <i>(full) Vladimír Siládi, Ladislav Huraj, Eduard Vesel and Norbert Polčák</i>	
	◦ Robust Moldable Scheduling Using Application Benchmarking for Elastic Environments <i>(short) Ibad Kureshi, Violeta Holmes and David Cooke</i>	
	◦ A Review of Disc Scrubbing and Intra Disc Redundancy Techniques for Reducing Data Loss in Disc File Systems <i>(short) Genti Daci and Aisa Bezhani</i>	
	Networks	
	◦ Implementation and Evaluation of a Sleep-Proxy for Energy Savings in Networked Computers <i>(short) Enida Sheme, Marin Aranitasi and Neki Frasheri</i>	
	◦ Analyses of QoS Routing Approach and the Starvation's Evaluation in LAN <i>(short) Ariana Bejleri, Igli Tafaj, Aleksander Biberaj, Eral Beqiri and Julian Fejzaj</i>	
13:00 – 14:30	Lunch break	
14:45 – 15:45+	Steering committee meeting	Teachers' Club – II floor
14:30 – 18:30	Tutorial: Automated Personality Classification – Data mining in Social Networks	a7
	<i>Aleksandar Kartelj, Vladimir Filipović, Veljko Milutinović</i>	
14:30 – 16:00	ISR2: Information Storage and Retrieval	cc10
	Session Chair: <i>Srđan Škrbić Christos K. Georgiadis</i>	
	◦ Data Model for Consortial Circulation in Libraries <i>(short) Danijela Tešendić</i>	

- Applying MDA in Developing Intermediary Service for Data Retrieval
(short) *Danijela Boberić Krstićev*
- A BIBO Ontology Extension for Evaluation of Scientific Research Results
(short) *Bojana Dimić Surla, Milan Segedinac and Dragan Ivanović*
- Collective Information Extraction using First-Order Probabilistic Models
(short) *Slavko Žitnik, Lovro Šubelj, Dejan Lavbič, Aljaž Zrnec and Marko Bajec*
- Cloud Computing Interoperability Approaches – Possibilities and Challenges
(short) *Magdalena Kostoska, Marjan Gusev, Sasko Ristov and Kiril Kiroski*

16:00 – 16:30 Coffee break

16:30 – 18:00 **DIS1: Database and Information Systems and**

cc10

Session Chair: Christos K. Georgiadis Tomáš Pitner

- Privacy-Aware eLearning-Enviroments-Based-on-Hippocratic-Database-Principles
(full) *Jasmin Azemović*
- Insider Threats in Corporate Environments: A case study for Data Leakage Prevention
(short) *Veroniki Stamati-Koromina, Christos Ilioudis, Demosthenes Stamatis, Christos K. Georgiadis and Richard Overill*
- ~~S-Suite: A Multipart Service Oriented Architecture for The Car Rental Sector~~
(short) ~~*Margarita Karkali and Michalis Vazirgiannis*~~
- + + ○ Challenging Issues of UCON in Modern Computing Environments
(full) *Christos Grompanopoulos and Ioannis Mavridis*

Computer Applications in Government

- Growth rate analysis of e-Government development
(full) *Kiril Kiroski, Marjan Gushev, Magdalena Kostoska and Sasko Ristov*
- Integrating Serbian Public Data into the LOD Cloud
(full) *Valentina Janev, Uroš Milošević, Mirko Spasić, Sanja Vraneš, Jelena Milojković and Branko Jireček*

19:20 Gathering in front of the Department building for the dinner

20:00 Conference Dinner – Restaurant “Terasa”, Petrovaradin Fortress

1.6 Wednesday, September 19

09:00 – 11:00	Info desk, in front of Hall I	
09:00 – 09:45	Invited Lecture 5 <i>Session Chair: Mirjana Ivanović</i> ○ Create, Collect and Share Course Materials Across Universities: Does it Work Successfully? <i>Klaus Bothe</i>	a1
09:45 – 10:30	Invited Lecture 6 <i>Session Chair: Zoran Budimac</i> ○ TEL research projects <i>Vladan Devedžić</i>	a1
09:00 – 10:30	Workshop on Applications of Software Agents, WASA, session 1 <i>Session Chair: Maria Ganzha and Costin Bădică</i> ++ ○ Developing Software Agents Using Enterprise JavaBeans <i>Dejan Mitrović, Mirjana Ivanović, Milan Vidaković, Ali Al-Dahoud</i> ○ Neuroevolution based Multi-Agent System for Micromanagement in Real-Time Strategy Games <i>Iuhasz Gabriel, Viorel Negru, Daniela Zaharie</i> ○ A Set-Based Approach to Negotiation with Concessions <i>Costin Bădică and Amelia Bădică</i> ○ Using Jason to Develop Declarative Prototypes of Automated Negotiations <i>Alex Muscar, Laura Surcel, Costin Bădică</i> ○ GliderAgent 2.0 – Agent-Based Glider Pilot Support System for Android Devices <i>Maria Ganzha, Mariusz M. Mesjasz, Marcin Paprzycki</i>	cc10
10:30 – 11:00	Coffee break	
11:00 – 12:30	Workshop: WASA – session 2 <i>Session Chair: Marcin Paprzycki and Mirjana Ivanović</i> ++ ○ GliderAgent 2.0 – Agent-Based Glider Pilot Support System for Android Devices <i>Maria Ganzha, Mariusz M. Mesjasz, Marcin Paprzycki</i> ○ Applying Saaty's Multicriterial Decision Making Approach in Grid Resource Management <i>Maria Ganzha, Marcin Paprzycki, Katarzyna Wasielewska</i> ○ New Outlook on Agent-Based Travel Support Systems <i>Maria Ganzha, Mariusz M. Mesjasz, Marcin Paprzycki</i> ○ Service Agents for Calendar Exchange <i>Magdalena Kostoska, Goran Velkoski, Krste Bozinoski, Sasko Ristov, Marjan Gusev</i> ○ Method for Optimizing Communication Costs in ACODA Using Simulated Annealing <i>Costin Bădică, Sorin Ilie, Mirjana Ivanović</i> ○ Developing Software Agents Using Enterprise JavaBeans <i>Dejan Mitrović, Mirjana Ivanović, Milan Vidaković, Ali Al-Dahoud</i>	cc10
11:00 – 12:30	CA3: Computer Applications in Education <i>Session Chair: Katerina Zdravkova</i> ○ International Educational Cooperation – One Possible Model <i>(full) Klaus Bothe, Zoran Putnik and Betim Çiço</i> ○ Modeling the Characteristics of a Learning Object for Use within e-Learning Applications <i>(full) George Nikolopoulos, Georgia Solomou, Christos Pierrakeas and Achilles Kameas</i> ○ Programming Techniques and Environments in a Technology Management Department <i>(full) Stelios Xinogalos</i> ○ Program Assessment via a Capstone Project <i>(short) John Galletly, Dimitar Christozov, Volin Karagiozov and Stoyan Bonev</i>	a1
11:00 – 12:30	DIS2: Database and Information Systems <i>Session Chair: Tomáš Pitner Srđan Škrbić</i>	cc1

- Correlation between Soft Organizational Features and Development of ICT Infrastructure
(full) *Mladen Čudanov, Ivan Todorović and Ondrej Jaško*
- ~~Challenging Issues of UCON in Modern Computing Environments~~
(full) ~~*Christos Grompanopoulos and Ioannis Mavridis*~~
- Information System Monitoring and Notifications using Complex Event Processing
(full) *Filip Nguyen and Tomáš Pítner*
- Storing XML Documents in Databases Using Existing Object-Relational Features
(short) *Dušan Petković*

12:30 – 23:00 Excursion to Zrenjanin and *Carska bara*

Lunch packet and dinner included

Closing session