

CONFERENCE PROGRAMME  
APPLICATIONS OF ALGEBRA X  
ZAKOPANE, 6TH—11TH MARCH 2006

TUESDAY, MARCH 7TH

**Morning session.**

- 9.50 Opening
- 10.00 Jean-Yves Beziau  
*Universal algebra and universal logic*
- 11.00 Coffee break
- 11.30 Janusz Czelakowski  
*Fixed-point theorems for relations and the back and forth method*

**Afternoon session.**

- 15.00 David Makinson  
*The Quantitative/Qualitative Watershed for Rules of Uncertain Inference*
- 16.00 Bernard Burgoyne  
*Foundational Problems in Mathematics: some Psychoanalytic Contributions*
- 17.00 Coffee break
- 17.30 Zofia Kostrzycka  
*On formulas of one variable in NEXT(KTB)*
- 18.00 Anna Chwastyk  
*Retracts and  $Q$  - independence*

WEDNESDAY, MARCH 8TH

**Morning session.**

- 10.00 Marek Zaionc  
*Proving by solving equations*
- 11.00 Adam Kolany  
*Sticking Attributes Method in Proving Validity of Inference Rules for Functional and Join Dependencies*
- 11.30 Coffee break
- 12.00 Mieczysław Kula  
*Generalized discrete logarithm problem*
- 12.30 Anna Szczerba-Zubek  
*Association Schemes in the Coding Theory*

**Afternoon session.**

- 15.00 Leonard Kwuida  
*Generalizations of Boolean algebras. An attribute exploration*
- 16.00 Srichan Arworn  
*Locally Strong Endomorphisms on Path*
- 16.30 Jutamas Damnernsawat  
*Diamond Products of Cayley Graphs of Groups*

THURSDAY, MARCH 9TH

**Morning: Trip.**

**Afternoon session.**

- 15.00 Oleg Tikhonenko  
*Systems of queues with common memory. Theoretical approach*
- 15.30 Rafał Tyrała  
*Linear systems with fuzzy numbers coefficients*
- 16.00 Agata Póioła  
*Verification of TCTL Properties of Time Petri Nets*
- 16.30 Coffee break
- 17.00 Prapa Vattanakeeree  
*Computer Support in Group-based Curricula, Study Program and Courses System*
- 17.30 Paweł Róg  
*Methods and algorithms for comparing of fuzzy intervals in application for simulation and ptimization problems*
- 18.00 Agata Pokropińska  
*Neuro-fuzzy Systems Applied in Medical Diagnosis Tasks*

FRIDAY, MARCH 10TH

**Morning session.**

- 10.00 Wojciech Penczek  
*Model Checking for Multivalued Logic of Knowledge and Time*
- 11.00 Bożena Woźna  
*A complete and decidable security-specialised logic and its application to the TESLA protocol*
- 11.30 Coffee break
- 12.00 Artur Gola  
*The methods goings-on with infeasible solutions in Genetic Algorithm's population*
- 12.20 Wojciech Nabiałek  
*On a translation from Promela to Intermediate Language of Verics*
- 12.40 Artur Niewiadomski  
*On a translation from UML to Intermediate Language of Verics*

**Afternoon session.**

- 15.00 Anetta Górnicka  
*Two formalizations of sentential calculi dual with respect to Łukasiewicz's three-valued calculi*
- 15.30 Jadwiga Knop  
*About some properties of connected sets*
- 16.00 Katarzyna Troczka  
*Some remarks on subquadratic function*
- 16.30 Coffee break
- 17.30 Barbara Kołodziejczak  
*Robust stability of some properties of matrices*
- 18.00 Mirosława Kołowska–Gawiejnowicz  
*Bilinear algebras*

SATURDAY, MARCH 11TH

**Morning session.**

- 10.00 Andrzej Zbrzezny  
*On implementation of SAT-based Model Checking Automata*
- 10.30 Gizela Jakubowska  
*Verifying Timed Properties of Security Protocols*
- 11.00 Mirosław Kurkowski  
*Verifying Cryptographic Protocols via Translation to Networks of Automata*
- 11.30 Coffee break
- 12.00 Magdalena Kacprzak  
*Model Checking Dining Cryptographers with Verics*
- 12.20 Maciej Orzechowski  
*On translation from Java to IL and extended automata*
- 12.40 Jacek Małek  
*On a crypto-messages parser*

**Afternoon session.**

- 15.00 Jurij Povstenko  
*Anomalous Diffusion*
- 15.30 Piotr Wasilewski  
*Informational Representation of Some Algebraic Structures*
- 16.10 Coffee break
- 16.40 Wojciech Dzik  
*On unification in some modal logics*
- 17.00 Joanna Grygiel  
*Reconstructing distributive lattices with reducible skeletons*
- 17.45 Closing ceremony