

# FCT 2017 Scientific Program

## Monday September 11 (morning)

8:15-8:50	Welcome Coffee and Registration
8:50-9:00	<b>Conference Opening</b>
9:00-10:00	<b>Invited Talk: Anca Muscholl (Bordeaux)</b>
	<i>A Tour of Recent Results on Word Transducers</i>
10:00-10:20	Coffee break
10:20-12:00	<b>Automata &amp; Logic</b>
	Christof Löding and Christopher Spinrath <i>Decision Problems for Subclasses of Rational Relations over Finite and Infinite Words</i>
	Pierre Ganty and Elena Gutiérrez <i>Parikh Image of Pushdown Automata</i>
	Emmanuel Filiot, Nicolas Mazzocchi and Jean-François Raskin <i>Decidable Weighted Expressions with Presburger Combinators</i>
	Kord Eickmeyer and Ken-Ichi Kawarabayashi <i>FO Model Checking on Map Graphs</i>
12:00-13:40	Lunch

# Monday September 11 (afternoon)

13:40-14:40	<b>Invited Talk: Martin Dietzfelbinger (Ilmenau)</b>
	<i>Optimal Dual-Pivot Quicksort: Exact Comparison Count</i>
14:40-15:30	<b>Routing Algorithms</b>
	Indranil Banerjee and Dana Richards <i>New Results on Routing via Matchings on Graphs</i>
	Till Fluschnik, Marco Morik and Manuel Sorge <i>The Complexity of Routing with Few Collisions</i>
15:30-15:50	Coffee break
15:50-17:05	<b>Algorithms</b>
	Gianluca De Marco, Tomasz Jurdziński, Michał Rózański and Grzegorz Stachowiak <i>Subquadratic Non-adaptive Threshold Group Testing</i>
	Markus Bläser, B. V. Raghavendra Rao and Jayalal Sarma <i>Testing Polynomial Equivalence by Scaling Matrices</i>
	Maxime Crochemore, Alice Héliou, Gregory Kucherov Laurent Mouchard, Solon Pissis and Yann Ramusat <i>Minimal Absent Words in a Sliding Window &amp; Applications to On-Line Pattern Matching</i>
17:05-17:15	Short pause
17:15-18:05	<b>Formal Languages</b>
	Max Kanovich, Stepan Kuznetsov and Andre Scedrov <i>Undecidability of the Lambek Calculus Extended with Subexponential and Bracket Modalities</i>
	Joost Engelfriet and Andreas Maletti <i>Multiple Context-free Tree Grammars and Multi-Component Tree Adjoining Grammars</i>
18:05-18:30	<b>Business Meeting</b>
18:45-19:00	<b>Conference Picture</b>
19:00-21:00	<b>Welcome Cocktail</b>

## Tuesday 12 September

8:30-9:00	Welcome Coffee
9:00-10:00	<b>Invited Talk: Jean-Éric Pin (Paris).</b> Talk in memory of Zoltán Ésik
	<i>Some Results of Zoltán Ésik on Regular Languages</i>
10:00-10:20	Coffee break
10:20-12:00	<b>Models of Computation &amp; Complexity</b>
	Jérémie Cabessa and Olivier Finkel <i>Expressive Power of Evolving Neural Networks Working on Infinite Input Streams</i>
	Holger Petersen <i>Busy Beaver Scores and Alphabet Size</i>
	Pushkar Joglekar, B. V. Raghavendra Rao, Siddhartha Sivakumar <i>On Weak-Space Complexity over Complex Numbers</i>
	Alexander Shen <i>Automatic Kolmogorov Complexity and Normality Revisited</i>
12:00-13:40	Lunch
13:40-14:40	<b>Invited Talk: Juraj Hromkovič (Zürich)</b>
	<i>What One Has to Know when Attacking P vs. NP</i>
14:40-15:30	<b>Best Papers</b>
	Matthias Bentert, Till Fluschnik, André Nichterlein, Rolf Niedermeier <i>Parameterized Aspects of Triangle Enumeration (BEST STUDENT PAPER)</i>
	Albert Atserias, Phokion Kolaitis and Simone Severini <i>Generalized Satisfiability Problems via Operator Assignments (BEST PAPER)</i>
15:30-15:50	Coffee break
15:50-17:05	<b>Graph Algorithms</b>
	Nicolas Bousquet, Aline Parreau and Arnaud Mary <i>Token Jumping in Minor-Closed Classes</i>
	Charis Papadopoulos and Spyridon Tzimas <i>Polynomial-Time Algorithms for the Subset Feedback Vertex Set Problem on Interval Graphs and Permutation Graphs</i>
	George Manoussakis <i>Listing all Fixed Length Simple Cycles in Sparse Graphs in Optimal Time</i>
18:30-23:00	<b>Social Event and Banquet</b>
	18:30-19:30: Guided visit in the city centre. 20:00-23:00 Banquet dinner at restaurant <a href="#">Café du Port</a> .

# Wednesday 13 September

8:30-9:00	Welcome Coffee
9:00-10:00	<b>Invited Talk: Thomas Colcombet (Paris)</b>
	<i>Automata and Program Analysis</i>
10:00-10:25	<b>Tropical Algebra</b>
	Dima Grigoriev and Vladimir Podolskii <i>Tropical Combinatorial Nullstellensatz and Fewnomials Testing</i>
10:25-10:45	Coffee break
10:45-12:25	<b>Quantum Computation &amp; Boolean Functions</b>
	Luc Sanselme and Simon Perdrix <i>Determinism and Computational Power of Real Measurement-based Quantum Computation</i>
	Anurag Anshu, Peter Høyer, Mehdi Mhalla and Simon Perdrix <i>Contextuality in Multipartite Pseudo-Telepathy Graph Games</i>
	Endre Boros, Ondrej Cepek and Kazuhisa Makino <i>Strong Duality in Horn Minimization</i>
	Christian Engels, B. V. Raghavendra Rao and Karteek Sreenivasaiah <i>On <math>\Sigma \wedge \Sigma \wedge \Sigma</math> Circuits: The Role of Middle <math>\Sigma</math> Fan-in, Homogeneity and Bottom Degree</i>
12:25-14:05	Lunch
14:05-15:45	<b>Distributed Algorithms &amp; Mobile Agents</b>
	Aris Pagourtzis, Giorgos Panagiotakos and Dimitris Sakavalas <i>Reliable Communication via Semilattice Properties of Partial Knowledge</i>
	Tomasz Jurdzinski and Michał Rózański <i>Deterministic Oblivious Local Broadcast in the SINR Model</i>
	Andreas Bärtschi and Thomas Tschager <i>Energy-Efficient Fast Delivery by Mobile Agents</i>
	Dariusz Dereniowski, Andrzej Lingas, Mia Persson, Dorota Urbańska and Paweł Żyliński <i>The Snow Team Problem (Clearing Directed Subgraphs by Mobile Agents)</i>
15:45-16:00	<b>Conference Closing and Coffee</b>