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Altri autori (Persone)	BouajjaniAhmed ChinWei-Ngan
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Soggetti	Software engineering Computer programming Computer networks Computer science Compilers (Computer programs) Software Engineering Programming Techniques Computer Communication Networks Computer Science Logic and Foundations of Programming Compilers and Interpreters
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Nota di bibliografia	Includes bibliographical references and index.
Nota di contenuto	Invited Talks -- Probabilistic Automata on Infinite Words: Decidability and Undecidability Results -- Abstraction Learning -- Synthesis: Words and Traces -- Regular Papers -- Promptness in ω -Regular Automata -- Using Redundant Constraints for Refinement -- Methods for Knowledge Based Controlling of Distributed Systems -- Composing Reachability Analyses of Hybrid Systems for Safety and Stability -- The Complexity of Codiagnosability for Discrete Event and Timed Systems -- On Scenario Synchronization -- Compositional Algorithms for LTL

Synthesis -- What's Decidable about Sequences? -- A Study of the Convergence of Steady State Probabilities in a Closed Fork-Join Network -- Lattice-Valued Binary Decision Diagrams -- A Specification Logic for Exceptions and Beyond -- Non-monotonic Refinement of Control Abstraction for Concurrent Programs -- An Approach for Class Testing from Class Contracts -- Efficient On-the-Fly Emptiness Check for Timed Büchi Automata -- Reachability as Derivability, Finite Countermodels and Verification -- LTL Can Be More Succinct -- Automatic Generation of History-Based Access Control from Information Flow Specification -- Auxiliary Constructs for Proving Liveness in Compassion Discrete Systems -- Symbolic Unfolding of Parametric Stopwatch Petri Nets -- Recursive Timed Automata -- Probabilistic Contracts for Component-Based Design -- Tool Papers -- Model-Checking Web Applications with Web-TLR -- GAVS: Game Arena Visualization and Synthesis -- CRI: Symbolic Debugger for MCAPI Applications -- MCGP: A Software Synthesis Tool Based on Model Checking and Genetic Programming -- ECDAR: An Environment for Compositional Design and Analysis of Real Time Systems -- Developing Model Checkers Using PAT -- YAGA: Automated Analysis of Quantitative Safety Specifications in Probabilistic B.-COMBINE: A Tool on Combined Formal Methods for Bindingly Verification -- Rbminer: A Tool for Discovering Petri Nets from Transition Systems.

Sommario/riassunto

These proceedings contain the papers presented at the 8th International Symposium on Automated Technology for Verification and Analysis held during September 21-24, 2010 in Singapore. The primary objective of the ATVA conference remains the same: to exchange and promote the latest advances of state-of-the-art research on theoretical and practical aspects of automated analysis, verification and synthesis. From 72 papers submitted to ATVA 2010 in response to our call for papers, the Program Committee accepted 21 regular papers and 9 tool papers. Each paper received at least three reviews. The Program Committee worked hard to ensure that every submission received a rigorous and fair evaluation, with the final program selected after a 10-day online discussion via the EasyChairs system.

Our program also included three keynote talks and invited tutorials by Thomas A. Henzinger (IST Austria), Joxan Jarar (National University of Singapore) and Igor Walukiewicz (CNRS, France).

The conference organizers were truly grateful to have such distinguished researchers as keynote speakers for the symposium. A new feature for the ATVA symposium this year were the two co-located workshops, In'nity 2010 (co-chaired by Yu-Fang Chen and Ahmed Rezhine) and PMCW 2010 (co-chaired by Jun Sun and Hai Wang). We are delighted with the expanded scope, interactions and depth that the two workshops helped bring to the symposium. Many people worked hard and offered their valuable time so generously to make ATVA 2010 successful. First and foremost, we would like to thank all authors who worked hard to complete and submit papers to the conference. The Program Committee members, reviewers and Steering Committee members also deserve special recognition. Without them, a competitive and peer-reviewed international symposium simply cannot take place.
