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Descrizione fisica	1 online resource (400 pages)
Collana	Lecture Notes in Computer Science, , 1611-3349 ; ; 13881
Disciplina	005.369
Soggetti	Computer science Computer science - Mathematics Logic programming Computers, Special purpose Software engineering Microprogramming Theory of Computation Mathematics of Computing Logic in AI Special Purpose and Application-Based Systems Software Engineering Control Structures and Microprogramming
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Note generali	Includes index.
Nota di contenuto	Distributing and Parallelizing Non-canonical Loops -- SMT-Based Modeling and Verification of Spiking Neural Networks: A Case Study -- StaticPersist : Compiler Support for PMEM Programming -- Symbolic Abstract Heaps for Polymorphic Information-flow Guard Inference -- Satisfiability Modulo Custom Theories in Z3 -- Bayesian parameter estimation with guarantees via interval analysis and simulation -- A Pragmatic Approach to Stateful Partial Order Reduction -- Compositional Verification of Stigmergic Collective Systems -- Efficient Interprocedural Data-Flow Analysis using Treedepth and Treewidth --

Maximal Robust Neural Network Specifications via Oracle-guided Numerical Optimization -- A generic framework to coarse-grain stochastic reaction networks by Abstract Interpretation -- CosySEL: Improving SAT Solving Using Local Symmetries -- Sound Symbolic Execution via Abstract Interpretation and its Application to Security -- Result Invalidation for Incremental Modular Analyses -- Synthesizing History and Prophecy Variables for Symbolic Model Checking -- Solving Constrained Horn Clauses over Algebraic Data Types -- ARENA: Enhancing Abstract Refinement for Neural Network Verification.

Sommario/riassunto

This book constitutes the proceedings of the 24th International Conference on Verification, Model Checking, and Abstract Interpretation, VMCAI 2023, which took place in Boston, USA, in January 2023. The 17 full papers presented in this book were carefully reviewed and selected from 34 submissions. The contributions deal with program verification, model checking, abstract interpretation, program synthesis, static analysis, type systems, deductive methods, decision procedures, theorem proving, program certification, debugging techniques, program transformation, optimization, and hybrid and cyber-physical systems.
