Record Nr. UNINA9910143450703321 Automata implementation: third International Workshop on **Titolo** Implementing Automata, WIA'98, Rouen, France, September 17-19. 1998 : revised papers / / Jean-Marc Champarnaud, Denis Maurel, Djelloul Ziadi (eds.) Pubbl/distr/stampa Berlin, Germany;; New York, New York:,: Springer,, [1999] ©1999 **ISBN** 1-280-94926-0 9786610949267 3-540-48057-9 Edizione [1st ed. 1999.] 1 online resource (253 p.) Descrizione fisica Lecture Notes in Computer Science, , 0302-9743 ; ; 1660 Collana Disciplina 004 Soggetti Machine theory Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Note generali Description based upon print version of record. Nota di bibliografia Includes bibliographical references and index. Nota di contenuto Extended Context-Free Grammars and Normal Form Algorithms -- On Parsing LL-Languages -- On Parsing and Condensing Substrings of LR Languages in Linear Time -- Minimal Cover-Automata for Finite Languages -- Determinization of Glushkov Automata -- Implementing Reversed Alternating Finite Automaton (r-AFA) Operations --Operations on DASG -- Implementation of Nondeterministic Finite Automata for Approximate Pattern Matching -- The Syntactic Prediction with Token Automata: Application to HandiAS System -- Bi-directional Automata to Extract Complex Phrases from Texts -- A Fast New Semiincremental Algorithm for the Construction of Minimal Acyclic DFAs --Using Acceptors as Transducers -- Proving Sequential Function Chart Programs Using Automata -- Automata and Computational Probabilities -- Automata and Binary Decision Diagrams -- Operations over Automata with Multiplicities -- Paging Automata -- On the Syntax. Semantics, and Implementation of a Graph-Based Computational

Environment -- The Finite State Automata's Design Patterns -- Automata to Recognize Finite and Infinite Words with at Least Two Factorizations on a Given Finite Set -- Autographe: A Graphical Version

of Automate -- INTEX 4.1 for Windows: A Walkthrough.

Sommario/riassunto

The papers contained in this volume were presented at the third international Workshop on Implementing Automata, held September 17 {19,1998, at the U- versity of Rouen, France. Automata theory is the cornerstone of computer science theory. While there is much practical experience with using automata, this work covers diverse - eas, includingparsing, computational linguistics, speech recognition, textsearing, device controllers, distributed systems, and protocolanalysis. Consequently, techniques that have been discovered in one area may not be known in another. In addition, there is a growing number of symbolic manipulation environments designed to assist researchers in experimenting with and teaching on automata and their implementation; examples include FLAP, FADELA, AMORE, Fire-Lite, Automate, AGL, Turing's World, FinITE, INR, and Grail. Developers of such systems have not had a forum in which to expose and compare their work. The purpose of this workshop was to bring together members of the academic, research, and industrial communities with an interestinim plementing automata, to demonstrate their work and to explain the problems they have been solving. These workshops started in 1996 and 1997 at the University of Western Ontario, London, Ontario, Canada, prompted by Derick Wood and Sheng Yu. The major motivation for starting these workshops was that there had been no single forum in which automataimplementation issues had been discussed. The interest shown in the r st and second workshops demonstrated that there was a need for such a forum. The participation at the third workshop was very interesting: we counted sixty-three registrations, four continents, ten countries, twenty-three universities, and three companies.