Record Nr. UNISA996465903303316 Parallel Computation [[electronic resource]]: Second International **Titolo** ACPC Conference, Gmunden, Austria, October 4-6, 1993. Proceedings / / edited by Jens Volkert Berlin, Heidelberg:,: Springer Berlin Heidelberg:,: Imprint: Springer, Pubbl/distr/stampa **ISBN** 3-540-48055-2 Edizione [1st ed. 1993.] 1 online resource (VIII, 256 p.) Descrizione fisica Lecture Notes in Computer Science, , 0302-9743 ; ; 734 Collana 003.3 Disciplina Soggetti Architecture, Computer Software engineering Computer programming Programming languages (Electronic computers) Algorithms Computer System Implementation Software Engineering/Programming and Operating Systems **Programming Techniques** Software Engineering Programming Languages, Compilers, Interpreters Algorithm Analysis and Problem Complexity Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Note generali Bibliographic Level Mode of Issuance: Monograph Nota di contenuto High-performance computing on a honeycomb architecture -- Refined local instruction scheduling considering pipeline interlocks --Microscopic and macroscopic dynamics -- Further results of the relaxed timing model for distributed simulation -- Pipelining computations on processor arrays with reconfigurable bus systems --An effective algorithm for computation of two-dimensional fourier transform for NxM matrices -- Rational number arithmetic by parallel p-adic algorithms -- Shortest non-synchronized motions parallel versions for shared memory crew models -- A pipeline algorithm for interactive volume visualization -- Data parallel programming: The

promises and limitations of high performance fortran -- Foundations

of practical parallel programming languages -- Prototyping parallel algorithms with proset-Linda -- Identifying the available parallelism using static analysis -- Automatic parallelization by pattern-matching -- Parallelization — A case study -- PVM 3 beyond network computing -- The design of the PACLIB kernel for parallel algebraic computation -- Generating parallel code from equations in the ObjectMath programming environments -- The paragon performance monitoring environment.

Sommario/riassunto

The Austrian Center for Parallel Computation (ACPC) is a cooperative research organization founded in 1989 to promote research and education in the field of software for parallel computer systems. The areas in which the ACPC is active include algorithms, languages, compilers, programming environments, and applications for parallel and high-performance computing systems. This volume contains the proceedings of the Second International Conference of the ACPC, held in Gmunden, Austria, October 1993. Authors from 17 countries submitted 44 papers, of which 15 were selected for inclusion in this volume, which also includes 4 invited papers by distinguished researchers. The volume is organized into parts on architectures (2 papers), algorithms (7 papers), languages (6 papers), and programming environments (4 papers).