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Loading OpenMP to Cell: An Effective Compiler Framework for Heterogeneous Multi-core Chip -- OpenMP Implementation of Parallel Linear Solver for Reservoir Simulation -- Parallel Data Flow Analysis for OpenMP Programs -- Design and Implementation of OpenMPD: An OpenMP-Like Programming Language for Distributed Memory Systems -- A New Memory Allocation Model for Parallel Search Space Data Structures with OpenMP -- Implementation of OpenMP Work-Sharing on the Cell Broadband Engine Architecture -- Toward an Automatic Code Layout Methodology -- An Efficient OpenMP Runtime System for Hierarchical Architectures -- Problems, Workarounds and Possible Solutions Implementing the Singleton Pattern with C++ and OpenMP -- Web Service Call Parallelization Using OpenMP -- Distributed Implementation of OpenMP Based on Checkpointing Aided Parallel Execution.

| Sommario/riassunto | This book constitutes the thoroughly refereed post-workshop proceedings of the Third International Workshop on OpenMP, IWOMP 2007, held in Beijing, China, in June 2007. The 14 revised full papers and 8 revised short papers presented were carefully reviewed and selected from 28 submissions. The papers address all topics related to OpenMP, such as OpenMP performance analysis and modeling, OpenMP performance and correctness tools and proposed OpenMP extensions, as well as applications in various domains, e.g., scientific computation, video games, computer graphics, multimedia, information retrieval, optimization, text processing, data mining, finance, signal and image processing, and numerical solvers. |