PASCO 2010 21 - 23 July 2010 Ensimag, Grenoble, France

http://pasco2010.imag.fr

Topics

- Design and analysis of parallel algorithms for computer algebra
- Practical parallel implementation of symbolic or symbolic-numeric algorithms
- High-performance software tools and libraries for computer algebra
- Applications of high-performance computer algebra
- Distributed data-structures for computer algebra
- Hardware acceleration technologies (multi-core, GPUs, FPGAs) applied to computer algebra
- Cache complexity and cache-oblivious algorithms for computer algebra
- Compile-time and run-time techniques for automating optimization and platform adaptation of computer algebra algorithms



Photo credit: Pierre Jayet

Grenoble Tourisme & Congrès

Invited Speakers

Christian Bertin (STMicroelectronics)

& Claude-Pierre Jeannerod, (INRIA), France.
Techniques and tools for implementing IEEE 754
floating-point arithmetic on VLIW integer processors.

Erich L. Kaltofen, North Carolina State University, USA. 15 years after DSC and WLSS2: what parallel computations I do today.

Stephen T. Lewin-Berlin,

Quanta Cambridge Research, Inc., USA Exploiting Multicore Systems with Cilk.



Tutorials

Jeremy Johnson, Drexel University, USA. *Automatic Performance Tuning*.

Daniel Kunkle, Northeastern University, USA. *Roomy: A System for Space Limited Computations*.

Conference Organization

- General Chairs: Marc Moreno Maza and Jean-Louis Roch
- Local arrangements and Programming Contest Chairs:
 Jean-Guillaume Dumas, Thierry Gautier, and Clément Pernet
- Administration: Danièle Herzog, Christian Séguy, Ahlem Zammit-Boubaker
- Publicity Chair: Daniel Cordeiro

Program Committee

- Daniel Augot
- Jean-Claude Bajard
- Olivier Beaumont
- Bruce Char
- Gene Cooperman
- Gabriel Dos-Reis
- Jean-Christophe Dubacq
- Jean-Guillaume Dumas
- Jean-Charles Faugere
- Matteo Frigo
- Thierry Gautier
- Pascal Giorgi

- Stef Graillat
- Jeremy Johnson
- Erich Kaltofen
- Herbert Kuchen
- Philippe LangloisAnton Leykin
- Michael Monagan
- Michael Monagan
 Marc Moreno Maza
- Winfried Neun
- Clement Pernet
- Nicolas Pinto

- Manuel Prieto-Matias
- Markus Pueschel
- Nathalie Revol
- Jean-Louis Roch
- David Saunders
- Eric Schost
- Arne Storjohann
- Sivan Toledo
- Gilles Villard
- Yuzhen Xie
- Kazuhiro Yokoyama













