

MaGiX@LiX 2011 Program

LIX, École polytechnique, September 19-23, 2011

Monday (amphi Gay-Lussac)

10h00 – 12h30	Morning session (chairman: BENJAMIN WERNER)
10h00 – 10h40	Registration, coffee
10h40 – 10h50	Welcome
10h50 – 11h40	Klaus Weihrauch (<i>A Foundation of Computable Analysis, the Representation Approach</i>)
11h40 – 12h30	Éric Walter (<i>Interval Analysis for Guaranteed Set Estimation</i>)
12h30 – 14h00	Lunch
14h00 – 17h50	Afternoon session (chairman: JORIS VAN DER HOEVEN)
14h00 – 14h50	Kyoko Makino (<i>Taylor models and their applications</i>)
14h50 – 15h40	Mickaël Gastineau & Jacques Laskar (TRIP)
15h40 – 16h10	Coffee break
16h10 – 17h00	François Boulier (<i>The FreeMabSys project and the Blad libraries</i>)
17h00 – 17h50	François Lemaire (<i>The FreeMabSys project and the MabSys library</i>)

Tuesday (amphi Gay-Lussac)

09h30 – 12h30	Morning session (chairman: MARC GIUSTI)
09h30 – 10h20	William Hart (<i>Fast Library for Number Theory, FLINT</i>)
10h20 – 10h50	Coffee break
10h50 – 11h40	Grégoire Lecerf (<i>MATHEMAGIX libraries</i>)
11h40 – 12h30	Fabrice Rouillier (<i>Exact computations and topology of plane curves</i>)
12h30 – 14h00	Lunch
14h00 – 17h50	Afternoon session (chairman: FRANÇOIS BOULIER)
14h00 – 14h50	Marc Moreno Maza (<i>Optimizing computer algebra software for data locality and parallelism</i>)
14h50 – 15h40	Mohab Safey el Din (<i>RAGlib: The Real Algebraic Geometry Library</i>)
15h40 – 16h10	Coffee break
16h10 – 17h00	Claude Gomez & Serge Steer (<i>Scilab: What's new ?</i>)
17h00 – 17h50	Damien Stehlé (FPLLL)

Wednesday (amphi Monge)

10h00 – 12h00	Morning session (chairman: STEPHEN WATT)
10h00 – 10h50	Bernard Mourrain (<i>Geometric Modeling and Computing with AXEL</i>)
11h10 – 12h00	Massimiliano Gubinelli (<i>A T_{EX}_{MACS} tutorial</i>)
12h00 – 19h00	Excursion to Vaux de Cernay abbey

Thursday (amphi Monge)

10h00 – 12h50	Morning session (chairman: DANIEL GRAYSON)
10h00 – 10h50	Quentin Carbonneaux & François Clément & Pierre Weis (<i>Parallel programming with Sklml</i>)
10h50 – 11h10	Coffee break
11h10 – 12h00	Joris van der Hoeven (<i>MATHEMAGIX Compiler</i>)
12h00 – 12h50	Marc Pouzet (<i>Some recent developments and extensions of Synchronous Languages</i>)
12h50 – 14h10	Lunch
14h10 – 18h00	Afternoon session (chairman: MASSIMILIANO GUBINELLI)
14h10 – 15h00	Daniel Grayson (<i>MACAULAY2</i>)
15h00 – 15h50	Hans Schönemann (<i>Anatomy of SINGULAR</i>)
15h50 – 16h20	Coffee break
16h20 – 17h10	Stephen Watt (<i>What Can We Learn from ALDOR?</i>)
17h10 – 18h00	Gabriel Dos Reis (<i>An OPENAXIOM Perspective on Pathways towards Dependable Computational Mathematics</i>)

Friday (amphi Sauvy)

09h50 – 12h20	Morning session (chairman: BERNARD MOURRAIN)
09h50 – 10h30	Angelos Manzaflaris (<i>Geometric computation behind Axel modeler</i>)
10h30 – 11h00	Coffee break
11h00 – 11h40	Stephen Watt (<i>The Mathematics of Mathematical Handwriting Recognition</i>)
11h40 – 12h20	Joris van der Hoeven (<i>Semantic editing with GNU T_{EX}_{MACS}</i>)
12h20 – 14h00	Lunch
14h00 – 17h50	Afternoon session (chairman: GRÉGOIRE LECERF)
14h00 – 14h50	Jean-Michel Muller (<i>Exact computations with an arithmetic known to be approximate</i>)
14h50 – 15h40	Paul Zimmermann (<i>GNU MPFR</i>)
15h40 – 16h10	Coffee break
16h10 – 17h00	Jean-Charles Faugère (<i>High Performance Implementation for Change of Ordering of Zero-dimensional Gröbner Bases</i>)
17h00 – 17h50	Emmanuel Thomé (<i>CADO-NFS: An implementation of the Number Field Sieve</i>)