# Mathematics Calendar 

The most comprehensive and up-to-date Mathematics Calendar information is available on e-MATH at http://www.ams.org/mathcal/.

## December 2003

5-8 Numerical Probabilistic Methods for High-Dimensional Problems in Finance, AIM Research Conference Center, Palo Alto, California. (Aug. 2003, p. 846)
8-12 Stochastic Methods in Coagulation and Fragmentation, Isaac Newton Institute for Mathematical Sciences, Cambridge, UK. (Jun./Jul. 2003, p. 724)
9-13 Ricci Flow and Geometrization of 3-Manifolds, AIM Research Conference Center, Palo Alto, California. (Nov. 2003, p. 1313)
*11-13 Workshop on Bifurcation Theory and Spatio-Temporal Pattern Formation in PDE, The Fields Institute, Toronto, Canada. Overview: Nonlinear phenomena and the formation of spatiotemporal patterns play an increasingly important role in current research on partial differential equations. Progress in the past quarter-century in the development of equivariant bifurcation theory and the theory of mode interactions and deterministic chaos has made possible a better understanding of spatio-temporal patterns in a wide variety of physical and biological contexts. This workshop will contribute to the thematic program along this important direction of current research and will complement the related Workshop on Patterns in Physics, November 14-18, 2003. Recent progress in equivariant bifurcation theory for Hamiltonian systems and in particular the Hamiltonian-Hopf bifurcation also will be addressed in the proposed workshop, thus providing a segue to the winter-spring component of the thematic program on PDE's.

The workshop will be dedicated to Professor William Langford, one of the pioneering researchers in the field of bifurcation theory in Canada. At the banquet on Friday evening, we will recognize his
fundamental contributions and leadership in bifurcation theory and pattern formation, and acknowledge his service to the Canadian mathematical community, on the occasion of his 60th birthday.
Organizers: A. T. Lawniczak (Guelph), W. Nagata (UBC), V. G. LeBlanc (Ottawa), N. Sri Namachchivaya (Illinois at Urbana-Champaign).
Sponsor: The workshop is financially sponsored and hosted by The Fields Institute. Additional financial support is provided by the Department of Mathematics and Statistics, University of Guelph.
Invited Speakers: S. A. Campbell (Waterloo), J. Chadam (Pittsburgh), S.-N. Chow (Georgia Institute of Technology), W. Craig (McMaster), M. Dellnitz (Paderborn), M. Field (Houston), L. Glass (Centre for Nonlinear Dynamics, McGill), M. Golubitsky (Houston), J. Guckenheimer (Cornell), P. Holmes (Princeton), G. Iooss (Institut Non-Linéaire, Nice), C. Jones (Brown), H. Keller (California Institute of Technology), Y. Kevrekidis (Princeton), B. Keyfitz (Houston), E. Knobloch (Leeds), M. Krupa (New Mexico State), J. Lamb (Imperial College, London), I. Melbourne (Surrey), S. Morris (Toronto), M. Pugh (Toronto), A. Vanderbauwhede (Gent), J. Wu (York), J. Yorke (Maryland), P. Yu (UWO).
Information: http://www.fields.utoronto.ca/programs/ scientific/03-04/bifurcation/.

11-16 Conference on Algebra and Number Theory, The University of Hyderabad, India. (Oct. 2003, p. 1129)
14-16 International Conference on Matrix Analysis and Applications, Nova Southeastern University, Fort Lauderdale, Florida. (Mar. 2003, p. 408)
14-17 International Workshop on Efficient Techniques for Numerical Solutions of Coupled PDE'S and Applications to Reservoir Simulation, Institute for Studies in Theoretical Physics

This section contains announcements of meetings and conferences of interest to some segment of the mathematical public, including ad hoc, local, or regional meetings, and meetings and symposia devoted to specialized topics, as well as announcements of regularly scheduled meetings of national or international mathematical organizations. A complete list of meetings of the Society can be found on the last page of each issue.
An announcement will be published in the Notices if it contains a call for papers and specifies the place, date, subject (when applicable), and the speakers; a second announcement will be published only if there are changes or necessary additional information. Once an announcement has appeared, the event will be briefly noted in every third issue until it has been held and a reference will be given in parentheses to the month, year, and page of the issue in which the complete information appeared. Asterisks (*) mark those announcements containing new or revised information.
In general, announcements of meetings and conferences held in North America carry only the date, title of meeting, place of meeting, names of speakers (or sometimes a general statement on the program), deadlines for abstracts or contributed papers, and source of further information. Meetings held outside the North American area may carry more detailed information. In any case, if there is any application deadline with
respect to participation in the meeting, this fact should be noted. All communications on meetings and conferences in the mathematical sciences should be sent to the Editor of the Notices in care of the American Mathematical Society in Providence or electronically to notices@ams.org or mathcal@ams.org.
In order to allow participants to arrange their travel plans, organizers of meetings are urged to submit information for these listings early enough to allow them to appear in more than one issue of the Notices prior to the meeting in question. To achieve this, listings should be received in Providence eight months prior to the scheduled date of the meeting.
The complete listing of the Mathematics Calendar will be published only in the September issue of the Notices. The March, June, and December issues will include, along with new announcements, references to any previously announced meetings and conferences occurring within the twelve-month period following the month of those issues. New information about meetings and conferences that will occur later than the twelve-month period will be announced once in full and will not be repeated until the date of the conference or meeting falls within the twelve-month period.
The Mathematics Calendar, as well as Meetings and Conferences of the AMS, is now available electronically through the AMS website on the World Wide Web. To access the AMS website, use the URL: http://www. ams.org/.
and Mathematics (IPM), Tehran, Iran. (Nov. 2003, p. 1313)
14-18 Computational Algebraic Statistics, AIM Research Conference Center, Palo Alto, California. (Aug. 2003, p. 846)
*15-18 DIMACS Workshop on Algebraic Coding Theory and Information Theory, DIMACSCenter, CoREBldg, Rutgers University, Piscataway, New Jersey.
Short Description: Discoveries made in coding theory in the 1990s brought forward a number of new topics that presently attract attention of specialists. Present-day developments in coding theory are concentrated around low-complexity code families, algebraic and lattice decoding, code design for multiple access channels, interplay with the theory of random matrices, quantum error correction, quantization, nontraditional applications of coding theory such as alternatives to routing in networks, coding of correlated sources, problems in theoretical computer science. Expanding into these areas enriched coding theory research with new problems and ideas. On the other hand, a number of recent studies in information theory attempt at developing structured code families as an alternative to random coding arguments usually employed to establish performance limits.

The overall purpose of the workshop is to establish or further links between algebraic coding and information/communications theory. The workshop will feature theoretical contributions in some of the named areas, both new results and tutorial presentations. It will have a substantial educational component, exposing coding theorists to a new range of problems and presenting constructive methods to the information theory community. It is hoped that as a result of the workshop, experts in coding theory will be able to identify problems in information theory that can be addressed with coding theory methods, and information theorists will become more familiar with ideas used for code construction.
Organizers: A. Ashikhmin, Bell-Labs, aea@research.bell-labs. com; A. Barg, DIMACS, abarg@ieee.org; I. Duursma, University of Illinois, duursma@math.uiuc.edu.
Information: http://dimacs.rutgers.edu/Workshops/ CodingTheory/.

15-19 Numerical Methods in Imaging Science and Information Processing, Institute for Mathematical Sciences, National University of Singapore, Singapore. (Dec. 2002, p. 1422)
15-19 The 8th Asian Technology Conference in Mathematics, Chung Hua University, Hsin-Chu, Taiwan. (Apr. 2003, p. 499)

15-19 (REVISED) The 28'th Australasian Conference on Combinatorial Mathematics and Combinatorial Computing, Melbourne, Australia. (Sept. 2003, p. 1000)
17-20 First Joint International Meeting between the American Mathematical Society and Various Indian Mathematical Societies, Bangalore, India. (Sept. 2002, p. 1001)
18-20 1st Indian International Conference on Artificial Intelligence (IICAI-03), Hyderabad, India. (Aug. 2003, p. 846)

* 19-21 WSEAS Multiconferences, Tenerife, Canary Islands, Spain. (Jun./Jul. 2003, p. 724)
Deadline (REVISED): October 31, 2003.
Information: http://www.wseas.org/.
20-22 International Symposium on Recent Advances in Mathematics \& Its Applications (ISRAMA 2003), Kolkata (Calcutta), India. (Jun./Jul. 2003, p. 724)

22-25 International Conference on Analysis and Applications, Department of Mathematics, Banaras Hindu University, Varanasi 221 005, India. (Jun./Jul. 2003, p. 724)
29-January 2 International Conference on Geometry and Spectral Theory, Technion-Israel Institute of Technology, Haifa, Israel. (Nov. 2003, p. 1313)

## January 2004

*2-31 (REVISED) Statistical Methods in Microarray Analysis, Institute for Mathematical Sciences, National University of Singapore.
Program: This is a program of the Institute for Mathematical Sciences at the National University of Singapore. The development and applications of microarray technology give rise to many problems that need to be addressed by the collective knowledge and skills of mathematicians and biologists. This program aims to study the many new statistical methods tailored to microarrays developed in the last few years. Its main objective is to bring together a group of leading researchers in microarrays to discuss their current work and to exchange ideas among themselves as well as with local researchers on the future statistical challenges for microarrays.
Topics: In addition to seminars and informal discussions, the program will consist of a tutorial on background material and a workshop at research level. The tutorial will be held from January 2 to January 6, 2004, and it will be followed by a workshop held throughout the rest of January 2004.
Organizing Committee: T. Speed, chair (Univ. of Calif. at Berkeley and Walter \& Eliza Hall Institute of Medical Research, Australia); M.-Y. Leung (Univ. of Texas at El Paso) and L. Zhang (Nat. Univ. of Singapore).
Members: A. Kuk (National Univ. of Singapore), A. Owen (Stanford Univ.), S. Richardson (Imperial College, UK) and W. H. Wong (Harvard Univ.)
Information \& Registration: Registration forms for participation in the tutorial or workshop are available at http://www.ims. nus.edu.sg/Programs/microarray/index.htm. Completed forms should be received by the Institute at least one month before commencement of each activity. Registration is free of charge. Institute membership is not required for participation. Institute Membership: Membership application for visiting the Institute under the program is also available from the website above. Members of the Institute do not need to register for specific activities. Contacts: For general enquiries, please email ims@nus. edu.sg while for enquiries on scientific aspects of the program, please email M.-Y. Leung at mleung@utep.edu. More information about the program is available at the website http://www.ims. nus.edu.sg/Programs/microarray/index.htm.
*4-6 Call for Papers: Eighth International Symposium on Artificial Intelligence and Mathematics, Ft. Lauderdale, Florida.
Approach: The International Symposium on Artificial Intelligence and Mathematics is the eighth of a biennial series. The series was started by Martin Golumbic, and the editorial board of the Annals of Mathematics and Artificial Intelligence serves as the permanent Advisory Committee. The objective of the symposium is to foster interactions between mathematics, theoretical CS, and artificial intelligence. The Symposium includes invited speakers, special topic sessions, and presentations of submitted papers.
Invited Speakers: R. Bixby and R. Brafman.
Topics/Organizers: Preferences, R. Brafman, Ben-Gurion Univ., Israel; Portfolio Design for Combinatorial Problems, C. Gomes, B. Selman, Cornell, USA; Artificial Intelligence and Game Theory, K. Leyton-Brown, Stanford, USA, M. Tennenholtz, Technion, Israel. Deadline: Paper submission deadline: October 3, 2003
Information: http://rutcor.rutgers.edu/~amai.
5-9 International Workshop on Groups, Geometry and Dynamics, Technion-Israel Institute of Technology, Haifa, Israel. (Nov. 2003, p. 1313)

5-9 Workshop on Large $N$ Limits of $U(N)$ Gauge Theory in Physics and Mathematics, Centre de Recherches Mathématiques, Montréal, Québec, Canada. (Aug. 2003, p. 846)

7-9 IMA Short Course: The Internet for Mathematicians, University of Minnesota, Minneapolis, Minnesota. (Mar. 2003, p. 408)

7-10 Joint Mathematics Meetings, Phoenix Civic Plaza, Phoenix, Arizona. (Sept. 2002, p. 1001)
9-10 2003-04 ASL Winter Meeting (with Joint Mathematics Meetings), Phoenix, Arizona. (Apr. 2003, p. 499)
11 IMA Tutorial: Measurement, Modeling and Analysis of the Internet, University of Minnesota, Minneapolis, Minnesota.
Organizers: B. Hajek (Illinois), D. Towsley (Massachusetts). (Mar. 2003, p. 408)
11-14 Thompson's Group at 40 Years, AIM Research Conference Center, Palo Alto, California. (Aug. 2003, p. 846)
12-16 IMA Workshop 4: Measurement, Modeling and Analysis of the Internet, University of Minnesota, Minneapolis, Minnesota. (Mar. 2003, p. 408)
12-1 7 Percolation, Particle Systems and Random Media, Pontificia Universidad Catolica de Chile, Santiago de Chile, Chile. (Nov. 2003, p. 1314)

12-17 Winter School on Transport Equations and Control Theory for PDEs, Casa della Gioventù, Bressanone (Bolzano), Italy. (Oct. 2003, p. 1128)
18-22 Computing: The Australasian Theory Symposium, University of Otago, Dunedin, New Zealand. (Aug. 2003, p. 846)

* 19-28 Advanced Course on Ramsey Methods in Analysis, Barcelona, Spain.
Organizer: Centre de Recerca Matemàtica (crm@crm.es).
Coordinator: J. Bagaria.
Information: http://www.crm.es/RamseyMethods.
19-July 9 Statistical Mechanics of Molecular and Cellular Biological Systems, Isaac Newton Institute for Mathematical Sciences, Cambridge, England. (Mar. 2003, p. 408)
20-25 International Educational Conference \& Exhibition, Knowledge Village, Dubai, UAE. (Sept. 2003, p. 1002)
21-30 Advanced Course on Ramsey Methods in Analysis, Bellaterra (Barcelona), Spain. (Apr. 2003, p. 499)
23-24 Arithmetic Quantum Chaos (MAT Seminar, Montpellier, 2004), University of Montpellier II, Montpellier, France. (Nov. 2003, p. 1314)

26-July 16 Random Matrix Approaches in Number Theory, Isaac Newton Institute for Mathematical Sciences, Cambridge, England. (Mar. 2003, p. 408)

## February 2004

*2-13 (REVISED) Advanced Course on Contemporary Cryptology, Barcelona, Spain. (Apr. 2003, p. 499)
Coordinator: P. Morillo.
Organizer: Centre de Recerca Matemática.
Information: http://www.crm.es/ContemporaryCryptology.
8 IMA Tutorial: Robustness and the Internet: Design, Evolution, and Theoretical Foundations, University of Minnesota, Minneapolis, Minnesota. (Apr. 2003, p. 499)
9-13 IMA Workshop 5: Robustness in Complex Systems, University of Minnesota, Minneapolis, Minnesota. (Apr. 2003, p. 499)
17-20 Announcement and Call for Papers: IV International Symposium on Mathematical Methods Applied to the Sciences, San José, Costa Rica. (Aug. 2003, p. 847)

## March 2004

1-26 Markov Chain Monte Carlo: Innovations and Applications in Statistics, Physics, and Bioinformatics, Institute for Mathematical Sciences, National University of Singapore, Singapore. (Jun./Jul. 2003, p. 725)

4-6 Workshop on Spectral Geometry, Centre de Recherches Mathématiques, Montréal, Québec, Canada. (Aug. 2003, p. 847)
7 IMA Tutorial: Control and Pricing in Communication and Power Networks, University of Minnesota, Minneapolis, Minnesota. (Apr. 2003, p. 499)
8-1 3 IMA Workshop 6: Control and Pricing in Communication and Power Networks, University of Minnesota, Minneapolis, Minnesota. (Apr. 2003, p. 499)
8-June 11 Proteomics, Institute for Pure and Applied Mathematics, UCLA, Los Angeles, California. (Sept. 2003, p. 1003)

12-13 AMS Southeastern Section Meeting, Florida State Univ., Tallahassee, Florida. (Dec. 2002, p. 1001)
15-19 Workshop on Nonlinear Wave Equations, The Fields Institute, Toronto, Ontario, Canada. (Oct. 2003, p. 1128)
*17-21 International Workshop on Hysteresis and Multi-Scale Asymptotics, University College Cork, Cork, Ireland.
Aim: The aim of this workshop is to bring together leading researchers willing to learn and share problems and techniques related to the singular perturbations and hysteresis in applied problems.
Topics: Singular perturbations; hysteresis; economic dynamics; laser dynamics; chemical kinetics; control.
Scientific Committee: R. O'Malley (USA), V. Sobolev (Russia).
Organizers: J. Gleeson, M. Mortell, A. Pokrovskii.
Information: Additional information will be available shortly at the homepage of the workshop: http://euclid.ucc.ie/hamsa2004. htm.

26-27 AMS Central Section Meeting, Ohio Univ., Athens, Ohio. (Dec. 2002, p. 1001)

29-April 2 IMA Short Course: Tools for Modeling and Data Analysis in Finance/Asset Pricing, University of Minnesota, Minneapolis, Minnesota. (Apr. 2003, p. 499)
29-April 2 Workshop on Kinetic Theory, The Fields Institute, Toronto, Ontario, Canada. (Oct. 2003, p. 1128)

## April 2004

1-May 15 Econometric Forecasting and High-Frequency Data Analysis, Institute for Mathematical Sciences, National University of Singapore, Singapore. (Aug. 2003, p. 847)
2-4 Midwest Several Complex Variables Meeting, University of Western Ontario, London, Ontario, Canada. (Oct. 2003, p. 1128)
3-4 AMS Western Section Meeting, University of Southern California, Los Angeles, California. (May 2003, p. 604)
4-7 Fractal 2004, Vancouver, Canada. (Jun./Jul. 2003, p. 725)
5-8 Joint Meeting of the 56th British Mathematical Colloquium and the 17th Annual Meeting of the Irish Mathematical Society (BMC2004), Queen's University Belfast, Belfast, Northern Ireland. (Oct. 2003, p. 1128)
12-16 IMA Workshop 7: Risk Management and Model Specifications Issues in Finance, University of Minnesota, Minneapolis, Minnesota. (Apr. 2003, p. 499)
14-16 Multi-Objective Programming and Goal Programming (MOPGP’04), Hammamet, Tunisia. (Nov. 2003, p. 1314)
17-18 AMS Eastern Section Meeting, Rider Univ., Lawrenceville, New Jersey. (Sept. 2002, p. 1001)
19-24 CHT-04: Advances in Computational Heat Transfer, Cruise ship between Kirkenes and Bergen, Norway. (Jun./Jul. 2003, p. 725)
*22-24 SIAM International Conference on Data Mining (SDM04), Hyatt Orlando, Orlando, Florida.
Description: This conference will provide a forum for the presentation of recent results in data mining, including applications,
algorithms, software, and systems. There will be peer reviewed, contributed papers as well as invited talks and tutorials. Best paper awards will be given in different categories. Proceedings of the conference will be available both online at the SIAM website and in hard copy form. In addition, several workshops on topics of current interest will be held on the final day of the conference.
Conference co-chairs: C. Kamath, Lawrence Livermore National Laboratory; D. Skillicorn, Queen's University.
Program co-chairs: U. Dayal, Hewlett-Packard Laboratories; M. W. Berry, University of Tennessee.
Deadlines: Pre-registration deadline: Registration opens in January 2004. Deadline: March 19, 2004.

Information: email: ross@siam.org.
22-25 2004 ASL Spring Meeting (with APA), Chicago, Illinois. (Jun./Jul. 2003, p. 725)
*23-26 Theory of Motives, Homotopy Theory of Varieties, and Dessins d'Enfants, AIM Research Conference Center, Palo Alto, California.
Organizers: G. Carlsson and R. Jardine.
Topics: This workshop will bring together topologists working in the developing area of "homotopy theory of varieties" with number theorists and algebraic geometers working in subjects related to dessins d'enfants, and expose them to the techniques and ideas of the various subjects involved both in the number theoretic and topological areas.
Application deadline: December 1, 2003.
Information: http://aimath.org/ARCC/workshops/ motivesdessins.html.

## May 2004

3-5 SIAM Conference on Imaging Science (IS04), Marriott City Center, Salt Lake City, Utah. (Oct. 2003, p. 1128)
3-7 IMA Workshop 8: Model Implementation, Algorithms and Software Issues, University of Minnesota, Minneapolis, Minnesota. (Apr. 2003, p. 499)

## 3-8 AARMS-CRM-Workshop on Singular Integrals and Analysis on CR Manifolds, Halifax, Nova Scotia, Canada. (Aug. 2003, p. 847)

3-June 262004 Geometric Partial Differential Equations, Institute for Mathematical Sciences, National University of Singapore, Singapore. (Aug. 2003, p. 847)

4-7 Workshop on Spectral Theory and Automorphic Forms, Centre de Recherches Mathématiques, Montréal, Québec, Canada. (Aug. 2003, p. 848)
9-1 2 International Conference on Numerical Combustion (NC04), Hilton Sedona Resort \& Spa, Sedona, Arizona. (Nov. 2003, p. 1314)

11-15 IMA Hot Topics Workshop: Compatible Spatial Discretizations for Partial Differential Equations, Institute for Mathematics \& its Applications (IMA), University of Minnesota, Minneapolis, Minnesota. (Oct. 2003, p. 1129)
19-242004 ASLAnnual Meeting, CarnegieMellonUniv.,Pittsburgh, Pennsylvania. (Dec. 2002, p. 1422)
19-25 The Decidable and the Undecidable in Mathematics Education, Brno University of Technology, Brno, Czech Republic.
24-28 IMA Workshop 9: Financial Data Analysis and Applications, University of Minnesota, Minneapolis, Minnesota. (Apr. 2003, p. 499)
24-28 Workshop on Hamiltonian Dynamical Systems (jointly with The Fields Institute), Centre de Recherches Mathématiques, Montréal, Québec, Canada. (Aug. 2003, p. 848)

28-31 International Conference on Mathematics and Its Applications, City University of Hong Kong. (Sept. 2003, p. 1005)

June 2004
2004 Mathematical Foundations of Learning Theory, Barcelona, Spain. (Apr. 2003, p. 499)
2004 WSEAS Conferences, Corfu Island, Greece. (Apr. 2003, p. 500)
*1-4 International Workshop on Nonlinear Waves, The Chinese University of Hong Kong, Hong Kong.
Organizing Committee: S.-Y. Cheng (HKUST); P. Sheng (HKUST); X.-P. Wang (Co-Chair, HKUST); Z. Xin (Co-Chair, CUHK); S.-T. Yau (CUHK).
Invited Speakers: S. S. Antman (Univ. of Maryland); G. Bal (Columbia Univ.); G. Bao (Michigan State Univ.); C. Bardos (Univ. Paris 6); Y. Brenier (Univ. de Nice-Sophia-Antipolis); M. P. Brenner (Harvard Univ.); R. Caflisch (Univ. of California at Los Angeles); L.-T. Cheng (Univ. of California at San Diego); S. Childress (New York Univ.); O. Dorn (Univ. Carlos III de Madrid); W. E (Princeton Univ.); G. Fibich (Tel Aviv Univ.); K. Golden (Univ. of Utah); F. Golse (Ecole Normale Superieure); M. Guo (Peking Univ.); T. Y. Hou (Calif. Inst. of Tech.); S. Jin (Univ. of Wisconsin-Madison); J.-G. Liu (Univ. of Maryland); P. Markowich (Univ. of Vienna); G. Milton (Univ. of Utah); A. Nachbin (Inst. Nac. de Mate. Pura e Aplicada); S. Osher (Univ. of Calif. at Los Angeles); L. Ryzhik (Univ. of Chicago); J. Shatah (New York Univ.); M. Shelley (New York Univ.); P. Sheng (HKUST); K. Solna (Univ. of Calif. at Irvine); T. Spencer (Inst. for Adv. Study); W. Strauss (Brown Univ.); M. I. Weinstein (Bell Labor.); B. S. White (Exxon Res. and Eng.); J. Xin (Univ. of Texas at Austin); Z. Zhang (HKUST); H. Zhao (Univ. of Calif. at Irvine); J. Zhu (Univ. of Utah).
Information:http://www.ims.cuhk.edu.hk/cgi-bin/conference. cgi.

1-11 Workshop on Semi-classical Theory of Eigenfunctions and PDEs, Centre de Recherches Mathématiques, Montréal, Québec, Canada. (Aug. 2003, p. 848)
2-4 ICNPAA 2004: Mathematical Problems in Engineering and Aerospace Sciences, The West University of Timisoara, Romania. (May 2003, p. 604)
*7-10 Sixth International Conference on Monte Carlo and QuasiMonte Carlo Methods in Scientific Computing and Second International Conference on Monte Carlo and Probabilistic Methods for Partial Differential Equations, Juan-les-Pins, France. Description: This conference will bring together experts in the fields of mathematics, computer science, statistics, operations research, physics, engineering, and finance to discuss the latest developments in Monte Carlo and quasi-Monte Carlo methods and their applications and in the (numerical) analysis of PDEs by probabilistic techniques. The program will consist of invited plenary talks, several special thematic sessions, and contributed talks.
Program Committee: H. Faure (France), P. Glasserman (USA), S. Heinrich (Germany), F.J. Hickernell (Hong Kong), D. Lamberton (France), B.Lapeyre(France), P.L'Ecuyer (Canada),P.-L.Lions(France), H. Niederreiter (Singapore, co-chair), E. Novak (Germany), A. Owen (USA), G. Pages (France), P. Protter (USA), I.H. Sloan (Australia), D. Talay (France, co-chair), S. Tavare (USA), H. Wozniakowski (USA/Poland).
Invited Speakers: M. Broadie (USA), B. Jourdain (France), A. Keller (Germany), W.S. Kendall (UK), R. Keunings (Belgium), P.-L. Lions (France), A. Owen (USA), H. Wozniakowski (USA/Poland).
Call for Papers: Abstracts of contributed talks should be submitted to Denis Talay by February 14, 2004. The abstract should fit on one page and include the title of the talk, the name, affiliation, full postal address, and e-mail address of the speaker, and a summary of the talk which provides sufficient information to assess the relevance and novelty of the results. The preferred mode is electronic submission in LaTeX and Postscript/PDF formats. Notification of the acceptance of the talk will be given shortly after the above deadline. Proposals for special sessions comprising 3 or 4 talks are also solicited.

Contact: D. Talay, INRIA, 2004 Routes des Lucioles, B.P. 93, F-06902, S. Antipolis, France; email: Denis.Talay@sophia.inria.fr.

Information: Regularly updated information can be obtained from the Web page http://www-sop.inria.fr/omega/MC2QMC2004.

* 7-11 4th Conference on Poisson Geometry, University of Luxembourg, Luxembourg City, Grand-Duchy of Luxembourg.
Topics: This 4th conference on Poisson Geometry and related areas will focus on Poisson structures and generalizations, notions of equivalence, normal forms, hamiltonian systems and generalized moment maps, Poisson Lie groups, Poisson groupoids and dynamical Poisson groupoids, Poisson homogeneous and symmetric spaces, Lie and Courant algebroids, deformation quantization.
Invited Speakers: A. Alekseev (Geneva), A. S. Cattaneo (Zurich), R. L. Fernandes (Lisbon), P. Foth (Arizona), J. Grabowski (Warsaw), J. Huebschmann (Lille), J.-H. Lu (Arizona), K. C. H. Mackenzie (Sheffield), Y. Maeda (Keio), P. Monnier (Bordeaux), S. Parmentier (Lyon), O. Radko (Los Angeles), T. S. Ratiu (Lausanne), P. Severa (Bratislava), I. Vaisman (Haifa), A. Weinstein (Berkeley), P. Xu (Penn State), N. T. Zung (Toulouse) (to be extended).
Organizers: D. Arnal (Dijon), J.-P. Dufour (Montpellier), J. Grabowski (Warsaw), S. Gutt (Bruxelles), Y. Kosmann-Schwarzbach (Ecole Polytechnique, Palaiseau), P. Lecomte (Liège), Y. Maeda (Keio), C. Molitor-Braun (Luxembourg), V. Ovsienko (Lyon), N. Poncin (Luxembourg), A. Weinstein (Berkeley).
Deadlines: Registration: April 30, 2004; posters: March 31, 2004; grants (limited): December 31, 2003
Sponsors: Fonds National de la Recherche (FNR Luxembourg), Univ. of Luxembourg, Société mathématique du Luxembourg. Information: http://www.cu.lu/Poisson2004.
*9-12 Call for Papers/Abstracts/Submissions: Hawaii International Conference on Statistics, Mathematics and Related Fields, Sheraton Waikiki Hotel, Honolulu, Hawaii.
Description: The conference will provide many opportunities for academicians and professionals from statistics and/or mathematics related fields to interact with members inside and outside their own particular disciplines. Cross-disciplinary submissions with other fields are welcome.
Sponsor: East West Council for Education, Center of Asian Pacific Studies of Peking University.
Submission Deadline: January 21, 2004.
Information: Hawaii International Conference on Statistics, Mathematics and Related Fields, P.O. Box 75023, Honolulu, HI 96836 USA, fax: (808) 947-2420; telephone: (808) 946-9927; email: statistics@ hicstatistics.org; http://www.hicstatistics.org.

13-16 SIAM Conference on Discrete Mathematics (DM04), Loews Vanderbilt Plaza Hotel, Nashville, Tennessee. (Oct. 2003, p. 1129)
13-18 Algorithmic Number Theory Symposium VI (ANTS-VI), United States Naval Academy, Annapolis, Maryland. (Oct. 2003, p. 1129)

16-19 AIMS' Fifth International Conference on Dynamical Systems and Differential Equations, California State Polytechnic University, Pomona, California. (Aug. 2003, p. 848)

* 18-23 Mathematical Foundations of Learning Theory, Barcelona, Spain.
Organizer: Centre de Recerca Matemàtica (crm@crm.es). Coordinator: G. Lugosi.
Information: http://www.crm.es/MathematicalFoundations/.
*20-25 Canadian Number Theory Association VIII Meeting, University of Toronto, Toronto, Ontario, Canada.
Program: Plenary Lectures, Special Sessions, Contributed Talks. Special Sessions: Algebraic Number Theory, A. Weiss (Alberta); Analytic Number Theory, J. Friedlander (Toronto); Arithmetic Algebraic Geometry, R. Ramakrishna (Cornell); Computational Number

Theory, H. Williams (Calgary); Diophantine Analysis and Approximation, C. Stewart (Waterloo).
Contributed talks: There is space for a number of contributed talks. Please submit your abstract for consideration.
Information: http://www.fields.utoronto.ca/programs/ scientific/03-04/CNTA8/.

20-25 8th Symposium on Probability and Stochastic Processes, Universidad de las Americas, Cholula, Puebla, Mexico. (Nov. 2003, p. 1314)

21-25 Conference on Surface Water Waves, The Fields Institute, Toronto, Ontario, Canada. (Oct. 2003, p. 1129)
*27-July 22004 USENIX Annual Technical Conference, Boston, Massachusetts.
Description: USENIX has always been the place to present groundbreaking research and cutting-edge practices in a wide variety of technologies and environments. We are pleased to announce that in response to your feedback, the 2004 program has been reorganized and expanded. The new format will include additional tutorials, more security breakthroughs, and extra sessions devoted to Linux and Open Source Software. Join the community of programmers, developers, and systems professionals in sharing solutions and fresh ideas.
Information: http://www.usenix.org/events/usenix04/.
28-July 3 International Association for Statistical Education (IASE) 2004 Roundtable, Lund University, Lund, Sweden. (Sept. 2003, p. 1006)
*29-July 2 Days on Diffraction-2004, St. Petersburg Division of Steklov's Math. Inst. and St. Petersburg Univ., St. Petersburg, Russia.
Workshop Topics: All topics related to mathematical aspects of wave propagation, scattering and diffraction.
Organizers: Prof. V. M. Babich (PDMI), V. S. Buldyrev (SPbU), Euler Int. Math. Inst.
Deadline: Abstract submission by March 1, 2004.
Information: http://mph.phys.spbu.ru/DD.
30-July 7 Fourth World Congress of Nonlinear Analysts (WCNA2004), Hyatt Orlando, Orlando, Florida. (Aug. 2003, p. 849)

## July 2004

1-December 31 Wall Bounded and Free-Surface Turbulence and Its Computation, Institute for Mathematical Sciences, National University of Singapore, Singapore. (Aug. 2003, p. 849)
4-11 The 10th International Congress on Mathematical Education, Copenhagen, Denmark. (Oct. 2003, p. 1129)

* 5-9 8th International Conference on p-adic Functional Analysis, University Blaise Pascal, Clermont-Ferrand, France.
Description: Lectures will cover all domains on analytic functions in a p-adic fields and on p -adic functional analysis.
Scientific Committee: B. Diarra, (Univ. Blaise Pascal, ClermontFerrand), A. Escassut (Univ. Blaise Pascal, Clermont-Ferrand), A. Katsaras (Univ. of Ioaninna, Greece), L. Narici (St. John's Univ., Jamaica, NY, USA).
Information: email: Bertin.Diarra@math.univ-bpclermont.fr, alain.Escassut@math.univ-bpclermont.fr.
* 5-9 Eleventh International Conference on Fibonacci Numbers and their Applications, Braunschweig, Germany.
Call for Papers: The purpose of the conference is to bring together people from all branches of mathematics and science with interests in recurrence sequences, their applications and generalizations, and other special number sequences.
Local Organizer: H. Harborth.
Conference Organizer: W. Webb.
International Committee: A. Adelberg (USA), M. Bicknell-Johnson (USA), C. Cooper (USA), Y. Horibe (Japan), A. Horadam (co-chair)
(Australia), J. Lahr (Luxembourg), A. Philipou (co-chair) (Greece), G. Phillips (co-chair) (Scotland), A. Shannon (Australia), L. Somer (USA), J. Turner (New Zealand).
Local Committee: J.-P. Bode, A. Kemnitz, H. Weiss.
Deadline: Papers and abstracts should be submitted in duplicate to W. Webb by May 1, 2004 at: Dept. of Math., Washington State Univ., Pullman, WA 99164-3113; phone 509-335-3150. Electronic submissions, preferably in $\mathcal{A}_{\mathcal{M}} \mathcal{S}$-Tex, sent to: email: webb@math. wsu.edu.
Information: Contact H. Harborth at Diskrete Mathematik, TU Braunschweig, 38023 Braunschweig, Germany; phone: 49-5313917515; 49-531-322213; email: h.harborth@tu-bs.de.

5-9 Graphes et Combinatoire, un Colloque a la Memoire de Claude Berge, Université Paris 6, Paris, France. (Mar. 2003, p. 409)
5-9 19th "Summer" Conference on Topology and Its Applications, Department of Mathematics and Applied Mathematics, University of Cape Town, Rondebosch, South Africa. (Sept. 2003, p. 1006)

* 5-10 Non-commutative geometry and representation theory in mathematical physics, Karlstad University, Karlstad, Sweden. Scope and purpose: To cover an area lying between algebra, geometry and theoretical physics, including topics like: the representation theory of various algebraic structures; non-commutative geometry and C*-algebras; operads, vertex algebras and A-infinity-algebras; conformal field theory and topological field theory; symmetries and statistical properties of low-dimensional quantum systems.
Organizers: J. Fuchs (Karlstad), J. Mickelsson (Stockholm),G. Rozenblioum (Gothenburg), A. Stolin (Gothenburg).
List of speakers: M. Cederwall, T. Ekedahl, L. Faddeev, E. Frenkel, Y. Z. Huang, V. G. Kac, I. Kantor, A. A. Kirillov, P. Kulish, E. Langmann, O. A. Laudal, R. Nest, A. Niemi, N. Reshetikhin, K. Szlachanyi, C. Schweigert, L. Turowska, E. Zelmanov.

Information: http://a30.fys.kau.se/~teofys/ncg-rt/.

* 5-16 (REVISED) Advanced Course on Automata Groups, Barcelona, Spain. (Apr. 2003, p. 500)
Coordinator: W. Dicks.
Organizer: Centre de Recerca Matemàtica (crm@crm.es).
Information: http://www.crm.es/AutomataGroups.
*11-14 SIAM Conference on the Life Sciences (LSO4), Oregon Convention Center, Portland, Oregon.
About the Conference: The life sciences have become increasingly quantitative as new technologies facilitate collection and analysis of vast amounts of data ranging from complete genomic sequences of organisms to satellite imagery of forest landscapes on continental scales. As a consequence, mathematics and computational science have become crucial technologies for the study of complex models of biological processes.

The SIAM Activity Group on Life Sciences brings together researchers who seek to develop and apply mathematical and computational methods in all areas of the life sciences. This conference of the activity group will provide a cross-disciplinary forum for catalyzing mathematical research relevant to the life sciences. It will facilitate rapid diffusion of new mathematical and computational methods in the life sciences, and may stimulate more researchers to work in these important areas.
Conference Themes: The themes of the 2004 conference will include, but are not limited to: Ecology, Environmental and Evolutionary Biology, Genomics, Imaging, Neuroscience, Physiology and Immunology, Structural Biology, Modeling Diseases, Biomathematics in Industry.
Invited Plenary Speakers: High-Throughput Structure-Based Drug Discovery for Protein Kinases, S. Burley, Structural GenomiX (SGX), Inc.; Modelling Autoimmune (Type 1) Diabetes, L. Edelstein-Keshet, The University of British Columbia, Canada; Comparative Gene Structure and Gene Expression, T. Gaasterland, Rockefeller University; The Structure and Nonlinear Robustness of Complex Ecological

Networks, N. Martinez, San Francisco State University; Locomotion and Pattern Formation in Bacteria, G. Oster, University of California, Berkeley; Modeling the Kinetics of Viral Infections A. Perelson, Los Alamos National Laboratory, Neuronal Dynamics and the Basal Ganglia D. Terman, Ohio State University.
Deadline Dates: Minisymposium proposals: December 11, 2003. Minisymposium abstracts and contributed abstracts and Contributed papers in lecture format: January 8, 2004.
Information: email: ross@siam.org.
19-23 XVIII Escola de Algebra (Eighteenth Algebra School), State University of Campinas (UNICAMP), Campinas, SP/Brazil. (Oct. 2003, p. 1129)
24-28 European Congress on Computational Methods in Applied Sciences and Engineering, Jyväskylä, Finland. (Feb. 2003, p. 295)
25-31 2004 ASL European Summer Meeting (Logic Colloquium '04), Torino, Italy. (Jun./Jul. 2003, p. 725)
26-30 IMS Annual Meeting/6th Bernoulli World Congress, Barcelona, Spain. (Aug. 2003, p. 849)
26-30 Workshop on Spectral Theory of Schrödinger Operators, Centre de Recherches Mathématiques, Montréal, Québec, Canada. (Aug. 2003, p. 849)
26-30 XIV Brazilian Topology Meeting, Campinas, São Paulo, Brazil. (Sept. 2003, p. 1007)
26-31 2004 ASL European Summer Meeting (Logic Colloquium '04), Torino, Italy. (Apr. 2003, p. 500)

## August 2004

* 2-6 First Announcement: The 9th International Conference on Difference Equations and Applications ICDEA-9, University of Southern California, Los Angeles, California.
Main theme: Mathematical Biology under the auspices of the International Society of Difference Equations.
Organizers:R.J.Sacker, chairman,rsacker@math.usc.edu;S.Elaydi, selaydi@trinity.edu;D.Lutz,lutz@math.sdsu.edu; G. Sell, sell@ math.umn.edu.
Information: Further details, including names of the plenary speakers, willbe posted on the WWW as they become available. Seehttp:// math.usc.edu/~rsacker or the website of the International Society of Difference Equations, http://www.math.umn.edu/midwestpde.

2-6 Workshop on Dynamics in Statistical Mechanics, Centre de Recherches Mathématiques, Montréal, Québec, Canada. (Aug. 2003, p. 850)

2-27 Magnetic Reconnection Theory, Isaac Newton Institute for Mathematical Sciences, Cambridge, England. (Apr. 2003, p. 500)
6-7 New Directions in Probability Theory, Fields Institute, Toronto, Canada. (Aug. 2003, p. 850)

* 9-13 13th USENIX Security Symposium, San Diego, California. Description: The USENIX Security Symposium brings together researchers, practitioners, system administrators, system programmers, and others interested in the latest advances in security of computer systems.
Information: http://www.usenix.org/events/sec04/.
16-December 17 Quantum Information Science, Isaac Newton Institutefor Mathematical Sciences, Cambridge, England.(Apr. 2003, p. 500)

24-27 International Conference on Nonlinear Operators, Differential Equations and Applications (ICNODEA-2004), Babes-Bolyai University, Cluj-Napoca, Romania. (Sept. 2003, p. 1008)
30-September 3 9th Conference on Differential Geometry and Its Applications, Prague, Czech Republic. (Apr. 2003, p. 500)

## September 2004

1-6 (REVISED) Sixth Pan-African Congress of Mathematicians, Institute National des Sciences Appliquees et del la Technologie (INSAT), Université 7 Novembre à Carthage, Tunis, Tunisia. (May 2003, p. 604)

14-18 Third International Conference on Boundary Integral Methods: Theory and Applications, Brunel Univ., West London, United Kingdom. (Nov. 2002, p. 1287)
19-22 The First International Conference on Complex Systems CSIMTA 2004 (Complex Systems Intelligence and Modern Technology Applications), Cherbourg, France. (Oct. 2003, p. 1129)
October 2004
16-1 7 AMS Southeastern Section Meeting, Vanderbilt University, Nashville, Tennessee. (May 2003, p. 604)
16-17 AMS Western Section Meeting, University of New Mexico, Albuquerque, New Mexico. (May 2003, p. 604)

November 2004
6-7 AMS Eastern Section Meeting, University of Pittsburgh, Pittsburgh, Pennsylvania. (Sept. 2003, p. 1009)
December 2004
5-16 International Workshop on Nonlinear Partial Differential Equations, IPM, Tehran, Iran. (Aug. 2003, p. 850)
17-19 International Conference on Smarandache Algebraic Structures, Indian Institute of Technology, IIT Madras, Chennai600036 Tamil Nadu, India. (Aug. 2003, p. 850)

* 17-22 The Third International Congress of Chinese Mathematicians, The Chinese University of Hong Kong, Shatin, Hong Kong, P.R. China.

Description: The triennial Congress is hosted by institutions in Mainland China, Taiwan, Hong Kong, and Singapore in a rotating basis. The first two ICCM's were held in 1998 and 2001 with great success.

This third congress, ICCM 2004, will have both plenary and invited talks by distinguished researchers in every major fields, as well as contributed talks and poster sessions. Contributed papers on all major areas of mathematics are solicited. To make the congress a true worldwide gathering, all presentations will be given in English.
Information: ICCM2004, Department of Mathematics. Chinese University of Hong Kong, Shatin, NT, Hong Kong, fax: (852) 26035154; tel: (852) 2609-7989; email: iccm2004@math.cuhk.edu.hk; http://www.math.cuhk.edu.hk/conference/iccm2004.

January 2005
5-8 Joint Mathematics Meetings, Hyatt Regency Atlanta \& Atlanta Marriott Marquis, Atlanta, Georgia. (Sept. 2002, p. 1001)
17-July 15 Model Theory and Applications to Algebra and Analysis, Isaac Newton Institute for Mathematical Sciences, Cambridge, England. (Apr. 2003, p. 500)

