Dale Miller
Curriculum Vitae

Inria Saclay - Île-de-France & Laboratoire d'Informatique, LIX
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Employment

- September 2002 – Present: Directeur de Recherche (DRCE), Inria Saclay.
- September 2002 – December 2006: Professor, Ècole polytechnique.
- September 1997 – July 2001: Professor and Head. August 2001 – August 2002, Professor. Department of Computer Science and Engineering, The Pennsylvania State University.
- 1989 – 1997: Associate Professor with tenure, University of Pennsylvania
- 1983 – 1989: Assistant Professor, University of Pennsylvania
- 1978 – 1983: Research Assistant, Carnegie Mellon University
- Summers 1977, 78: Mathematician, AI Lab, National Bureau of Standards (now NIST)

Supported Visiting Positions

- February 2002: Guest professor, University Aix-Marseille 2 at the IML, Luminy.
- 23 January – 22 February 1997: Visiting Professor at the University of Sienna.
- 1 September – 31 October 1996: Visiting Professor at the University of Genoa.
- July 1994: Visiting Professor at the Universities of Pisa and Genoa.
- July 1991 – September 1991: SERC Visiting Fellow, University of Glasgow.
- September 1990 – June 1991: Visiting Research Scientist, LFCS, University of Edinburgh.

Education

- **Ph.D. Mathematics**, Carnegie Mellon University, December 1983. Supervised by Peter Andrews.
- **B.S. Mathematics**, Lebanon Valley College, May 1978.

Major Research Interests

- Computational logic, proof theory, linear logic, unification, proof search, game semantics.
- Declarative programming languages, particularly the logic and concurrency paradigms: their theory, design, and implementation.
- The specification of and reasoning about the operational semantics for programming languages.

Personal Information

- Married to Catuscia Palamidessi, an Italian citizen. Two children.
- USA citizen. Titre de sejour, France.

Invited Speaker at Conferences and Workshops

- Workshop on Proof Theory and its Applications, 6-7 September 2018 in Ghent, Beligum.
- LAP 2017: Sixth Conference on Logic and Applications, 18-22 September 2018, Dubrovnik, Croatia.
- PADL 2017: Nineteenth International Symposium on Practical Aspects of Declarative Languages, 16-17 January 2017, Paris.
- Workshop on linear logic, mathematics and computer science as part of "LL2016-Linear Logic: interaction, proofs and computation", 7-10 November 2016, Lyon. France.
- Linearity 2016. Porto, 25 June 2016.
- Research seminar titled "Interactions between logic, computer science and linguistics: history and philosophy", Université de Lille 3, 15 June 2016.
- CIPPMI (Current issues in the philosophy of practice of mathematics and informatics) Workshop on Proofs, justifications and certificates. 3-4 June 2016, Toulouse, France.
- TYPES 2016: 22nd International Conference on Types for Proofs and Programs. Novi Sad, Serbia, 23-26 May 2016.
- LSFA 2015: 10th Conference on Logical and Semantic Frameworks, with Applications, Natal Brazil, 30 August - 1 September 2015.
- Session on History and Philosophy of Computing at the 15th Congress of Logic, Methodology and Philosophy of Science, Helsinki, 3-8 August 2015.
- LOPSTR 2015: 25th International Symposium on Logic-Based Program Synthesis and Transformation and PPDP 2015: 17th International Symposium on Principles and Practice of Declarative Programming, Siena, 13-16 July 2015.
- $\forall X.X\Pi$ 2014: All about Proofs, Proofs for All, part of the Vienna Summer of Logic, 18 July 2014.
- LATD 2014: Logic, Algebra, and Truth Degrees, part of the Vienna Summer of Logic, 16-19 July 2014.
- LFMTP 2013: Logical Frameworks and Meta-Languages: Theory and Practice, affiliated with ICFP'13, Boston, 23 September 2013.
- ANR-DFG Hypothese Workshop titled *Different Aspects of Proof Theory*, ENS Paris, 3 May 2012.
- *Journees nationales du GDR-IM*, 25-26 January 2012, University of Paris 7.
- LMPS 2011: 14th International Congress of Logic, Methodology and Philosophy of Science, Nancy, France, 19-26 July 2011 (Section C1: Logic, Mathematics and Computer Science).
- APLAS 2010: Eighth Asian Symposium on Programming Languages and Systems, Shanghai Jiao Tong University, China, November 29 - December 1, 2010.
- FICS 2010: 7th Workshop on Fixed Points in Computer Science, Brno, Czech Republic, 21-22 August 2010.
- MLPA: 2nd Workshop on Module Systems and Libraries for Proof Assistants, a FLoC 2010 workshop associated with IJCAR and ITP, 15 July 2010.
- Colloquium on Games, Dialogue and Interaction, Université Paris 8, 28-29 September 2009.
- LAM 2009: Logics for Agents and Mobility. A workshop associated to LICS09. 9-10 August 2009.
- Journées du projet PEPS-Relations, University of Paris XIII, 15 - 16 December 2008.
- APS: 4th International Workshop on Analytic Proof Systems, part of LPAR 2008, Doha, Qatar, 22 November 2008.
- SOS 2008: Structural Operational Semantics, an affiliated workshop of ICALP 2008, Reykjavik, Iceland, 6 July 2008.
- WFLP 2008: 17th International Workshop on Functional and (Constraint) Logic Programming, Siena, 3-4 July 2008.
- LFMTP 2008: International Workshop on Logical Frameworks and Meta-Languages: Theory and Practice (affiliated with LICS08), Pittsburgh, 23 June 2008.

- Dimostrazioni, Polaritá e Cognizione, Facoltà di Lettere e Filosofia, Università di Roma Tre, 18 April 2008.
- Collegium Logicum 2007: Proofs and Structures, 24-25 October 2007, Vienna, Austria.
- IJCAR 2006: Joint Conference on Automated Reasoning (part of FLoC 2006). Seattle, 16-21 August 2006.
- Geometria della Logica, Facoltà di Lettere e Filosofia, Università di Roma Tre, 28-29 April 2006.
- Algebraic Process Calculus: The first 25 years and beyond, Bertinoro, Italy, 5 August 2005.
- Structure and Deduction 2005: an ICALP workshop, Lisbon, 16-17 July 2005.
- 2nd Taiwanese-French Conference in Information Technologies, Tainan, Taiwan, 23-25 March 2005.
- CSL 2004: 13th Annual Conference of the European Association for Computer Science Logic, Karkonoski National Park, Poland, 20-23 September 2004.
- TPHOLs 2003: International Conference on Theorem Proving in Higher Order Logics, 9-12 September 2003, Rome, Italy.
- Wollic 2003: 10th Workshop on Logic, Language, Information and Computation, 29 July - 1 August 2003, Ouro Preto, Minas Gerais, Brazil.
- Workshop on Process Algebra, Bertinoro, Italy, 23 July 2003.
- UNIF 2003: 17th International Workshop on Unification, 8-9 June 2003, Valencia, Spain.
- FSTTCS02: 22nd Foundations of Software Technology and Theoretical Computer Science, 12-14 December 2002, Indian Institute of Technology, Kanpur, India.
- AMAST02: 9th International Conference on Algebraic Methodology And Software Technology, September 9-13, 2002, St. Gilles les Bains, Reunion Island, France.
- TABLEAUX 2002: Automated Reasoning with Analytic Tableaux and Related Methods. Copenhagen, Denmark, July 30 - August 1, 2002.
- Second International Workshop on Foundations for Secure/Survivable Systems and Networks, 26 - 27 October 2001, Tokyo Institute of Technology, Tokyo, Japan.
- RTA 2000: 11th International Conference on Rewriting Techniques and Applications, 10-12 July 2000, University of East Anglia, Norwich, U.K.
- European Meeting of the Association for Symbolic Logic, Utrecht, 1-6 August 1999.
- TYPES'96: Workshop on Types, Aussois, France, 16-19 December 1996.
- Conference on Logical Aspects of Computational Linguistics, Nancy, 23-25 September 1996.
- Conference on Logics and Models of Computation, Marseille, 16 – 20 September 1996.
- Linear Logic '96, Tokyo, Japan, 29 March – 2 April 1996.
- Second New Zealand Formal Program Development Colloquium, Massey, 14 - 15 February 1996.
- Computing: The Australian Theory Seminar (CATS), Melbourne, 29 – 30 January 1996.
- The Fourth Compulog meeting, Vietri, Italy, 15 September 1995.
- GULP-PRODE'95: Italian-Spanish Joint Conference on Declarative Programming, Vietri, Italy, 11 – 14 September 1995.
- Joint meeting of Algebraic and Logic Programming (ALP) and Programming Languages Implementation and Logic Programming (PLILP), Madrid, September 1994.
- Fourth North American Jumelage meeting, SRI International, Menlo Park, CA, 13 – 17 October 1993.
- Second Compulog-Network Subgroup Meeting on Programming Languages, Pisa, 6 – 7 May 1993.
- MFPS'93: Ninth Conference on the Mathematical Foundations of Programming Semantics, New Orleans, LA, 7 – 10 April 1993.
- Fourth Intern. Workshop on Extensions of Logic Programming, St. Andrews, Scotland, March 1993.
- Workshop on Logic and Change during German AI Conference, Bonn, Germany, 18 – 19 Sept 1991.
- Second Russian Conference on Logic Programming, St. Petersburg, 11 – 15 September 1991.

- Logical Framework BRA ESPRIT Workshop, Edinburgh, 20 – 23 May 1991.
- Esprit project on Computational Logic, University of Tübingen, Germany, 24 – 26 September 1990.
- Esprit project on Logical Foundations, Nice, France, 7 – 12 May 1990.
- Workshop on Extensions to Logic Programming, Tübingen, Germany, 8 – 9 December 1989.
- Banff meeting on "Higher-Orders", Canada, 23 – 28 September 1989.
- Workshop on Proof, Cambridge University, England, 11 – 14 July 1988.
- Workshop on Meta Language and Tools for Mechanizing Formal Deductive Theories, Carnegie Mellon University, 13 – 14 November 1987.
- Sym. on Mathematical Foundations for Computer Science, IBM Japan, Oiso, Japan, 28 – 31 May 1985.
- Alfred Tarski Memorial Conference on Logic, Truth and Type-Theory, Ohio State Univ, 8 April 1984.

Invited Tutorials and Advanced Courses

- Graduate level course on "The proof theoretic foundation of computational logic," Dipartimento di Informatica, Università di Pisa, 10-16 September 2014.
- CUSO Winter School in Mathematics and Computer Science "Proof and Computation", Les Diablerets, Switzerland, 27-31 January 2013.
- Graduate level course on "Proof theory with applications to computation and deduction," Dipartimento di Informatica, Università di Pisa, 19-30 September 2011.
- PLS8: 8th Panhellenic Logic Symposium, Ioannina, Greece, July 4-8, 2011. Three hour tutorial.
- ISCL: International School on Computational Logic, Bertinoro, 10-15 April 2011. Six hours of lectures.
- Graduate level course on "Proof search and Computation." Dipartimento di Scienze dell'Informazione, Universitá degli studi di Milano, 15-26 March 2010.
- Graduate level course on "Proof systems for linear, intuitionistic, and classical logic." Dipartimento di Informatica, Universitá Ca' Foscari di Venezia, 15-24 April 2009.
- Wollic 2003: 10th Workshop on Logic, Language, Information and Computation, 29 July - 1 August 2003, Ouro Preto, Minas Gerais, Brazil.
- Summer School on the Proofs-as-Programs Paradigm, Eugene, Oregon, June 24 - July 5, 2002. Sponsored by NSF, ACM SIGPLAN, and INRIA.
- Workshop on Proof Theory and Computation, Dresden University of Technology, 3-14 June 2002.
- International School on Computational Logic (ISCL), Acquafredda di Maratea (Basilicata, Italy), September 4-9, 2000. Sponsored by Association for Logic Programming (ALP), the European COMPULOG net and by GULP.
- Eleventh European Summer School in Logic, Language and Information (ESSLLI-99), August 1999, Utrecht. Co-taught an introductory course of 7.5 hours with G. Nadathur.
- International Summer School on the Logic of Computation, Marktoberdorf, an Advanced Study Institute of the NATO Science Committee and the Technische Universität München, Germany, 29 July – 10 August 1997.
- Twenty hour course for PhD students at the University of Siena, Italy, 27 January – 11 Feburary 1997.
- One week course for PhD students at the University of Padova, Italy, 15 —19 July 1996. Ten hours of lectures.
- International Summer School on the Logic of Computation, Marktoberdorf, an Advanced Study Institute of the NATO Science Committee and the Technische Universität München, Germany, 25 July – 6 August 1995. Five hours of lectures. Lectures published by the NATO Press.
- Two week course for PhD students at the University of Pisa, 30 May – 10 June 1994. Twenty hours.
- Fourth International School for Computer Science Researchers, Acireale, Sicily, 22 June - 4 July 1992. Eight hours of lectures.

- Second International School of Philosophy of Science, sponsored by the International Centre for Theoretical Physics, Trieste, Italy, 27 October – 10 November 1991. Five hours of lectures.
- Third European Summer School in Language, Logic, and Information, Saarbrücken, 12 – 23 August 1991. Five hours of lectures.
- International Conference on Logic Programming, July 1991. Three hours of tutorial.
- ARO/ONR sponsored meeting on Formal Methods in Software Engineering, Ft. Monroe, 13 – 15 May 1991. Five hours of lectures.
- ALP meeting (UK Chapter), Edinburgh, 10 – 12 April 1991. Three hours of tutorial.
- International Conference on Automated Deduction, Kaiserslautern, Germany, July 1990. Three hours tutorial on jointly with Amy Felty, Elsa Gunter, and Frank Pfenning.
- ICLP90: International Conference on Logic Programming, July 1990. 90 minutes tutorial.
- Alghero, Sardinia, Italy, Advanced School on Foundations of Logic Programming, 17 – 23 September 1988. Six hours of tutorial.
- MCC, Parallel Processing Group, Austin Texas, 30 June – 3 July 1986. Twenty hours of lectures.
- Courses in Lisp and Prolog programming for the Army Research Office: March 1985, June 1985, January 1986, and June 1988.

Colloquia and Seminar Talks

2017 SD 2017: Structures and Deduction, Oxford, UK, 8 September • TLLA 17: Trends in Linear Logic and Applications, 3 September • Sémin'ouvert du LIX, 23 February

2016 ACADIA research centre, Ca' Foscari University, Venice, 27 April

2015 Journées ANR Rapido, PPS, 18 June • Semantics and Verification group at PPS, 11 June • ETH Zurick Department of Computer Science Distinguished Colloquium Series, 20 April • Inria Paris, Deducteam Seminar, 30 January

2014 IT University of Copenhagen, 11 September

2013 Groupe de travail Sémantique, PPS, University of Paris Diderot, 4 June • College of Engineering & Computer Science, Australian National University, 14 May • Department of Mathematics and Computer Science, Freie Universität Berlin, 22 February.

2012 Pisa Summer Workshop on Proof Theory. 12-15 June • CHocCoLa seminar, ENS Lyon, 15 March • Workshop on Certificates and Computation, ITU Copenhagen, 12 March • Department of Mathematics, Carnegie Mellon University, 5 April.

2011 POP Seminar, Carnegie Mellon University, 17 October • School of Computer Science, Colloquium Series, McGill University, 14 October • Workshop on Proof Theory, Paris, 16 June • Chalmers University of Technology, Göteborg, Sweden, 23-24 May • Technical University of Vienna, 12 January.

2010 University of Minnesota, 10 November • University of Bath, 15 September • INRIA-Loria, Nancy, 12 March • LRI, University of Paris South, 8 October.

2008 Laboratoire "Preuves, programmes, systémes" (PPS), 13 Nov • Workshop on Proof-search in Type Theories, LIX, 5 June.

2007 ICMS Workshop on Mathematical Theories of Abstraction, Substitution and Naming in Computer Science, Edinburgh, UK, 25-29 May.

2006 LIX, Ecole Polytechnique, 15 June • Laboratoire "Preuves, programmes, systémes" (PPS), 1 December.

2005 Universidad Complutense Madrid, 29 Nov • University of Pisa, Italy, 22 July • WIPS 2005: Workshop on Implementations of Proof Search, University of Minnesota, 1 July • University of Minnesota, 19 April • Academia Sinica, Taiwan, 28 March • 2nd Taiwanese-French Conference in Information Technologies, Tainan, Taiwan, 23-25 March.

2004 INRIA-Loria, Nancy, 7 December. • University of Pisa, Italy, 5 July • PPS Paris VII, 24 June • ACI Workshop on "Théorie des preuves des types inductifs et coinductifs", 17 June • ACI Workshop on "Modèles pour la concurrence et la mobilité", 26 May • LRI, CNRS-Université de Paris Sud, 30 January.

2003 Groupe de travail "Sémantique", PPS Paris VII, 2 December • Workshop PCRI-CEA List, 18 November • Computer Science Department, Dresden University of Technology, 22 September • LIX, École polytechnique, 15 March • LIPN, Univ of Paris 13, 17 March • Institut d'Informatique, Facultés Universitaires Notre-Dame de la Paix, Namur, Belgium, 24 February • LSV, ENS Cachan, 18 Feburary • INRIA Rocquencourt, 17 January.

2002 IIT Delhi, 10 December • INRIA Sophia Antipolis, 26 March • DIP, Universitá di Firenze, 8 March • LIP, ENS/Lyon, 22 February • Logic and Interaction Meeting, CIRM, Luminy, 18, 25 February.

2001 INRIA Rocquencourt, 22 May. • LRI, CNRS-Université de Paris Sud, 19 November. • Departamento de Informatica, Pontificia Universidade Catolica do Rio de Janeiro (PUC-Rio), Brazil, 13 December.

2000 LIPN, Institut Galilee, University of Paris 13, 15 December. • LFCS, Edinburgh University, 6 December. • Computer Science Department, Dresden University of Technology, 30 November. • INRIA Rocquencourt, 17 July.

1999 Penn State Logic Seminar, 28 September, 5 October.

1998 Penn State Logic Seminar, 5 May.

1997 Department of Computer Science, University of Chicago, 8 October. • DMI, Ecole Normale Superieure, Paris, 13 January.

1996 Dipartimento di Informatica e Scienze dell'Informazione, Genoa, Italy, 11 December. • Research seminar on "The Mechanization of Inference", Ohio State University, 26 November. • Department of Computer Science, SUNY Stony Brooks, 20 May. • Department of Mathematics, Wesleyan University, 16 May. • Department of Computer Science, Portland State University, 12 April. • Department of Computer Science, Oregon Graduate Institute, 10 April. • Department of Computer Science, University of Auckland, 9 February. • Unit of Information Technology, University of Technology, Sydney, 7 February. • Royal Melbourne Institute of Technology, Melbourne, 25 January. • Department of Mathematics, University of Siena, 9 January.

1995 Department of Mathematics, University of Padua, 2 June. • University of Pisa, Italy, 9 June. • Dpto. de Lenguajes y Ciencias de la Computacion, Universidad de Malaga, 22 May. • Department of Computer Science, University of Edinburgh, 26 May.

1994 Computer Science Department, Penn State University, December. • Computer Science Department, Duke University, November. • INRIA, Rocquencourt, France, July. • Irisa, Rennes, France, July. • Dipartimento di Informatica e Scienze dell'Informazione, Genoa, Italy, June. • School of Computer Science, Carnegie Mellon University, February.

1992 Computer Science Department, Simon Fraser University, November. • Computer and Information Science, Syracuse University, 20 March. • State University of New York at Buffalo, 30 April. • Swarthmore College, 12 February.

1991 Edinburgh University, Computer Science Department, 24 September. • Glasgow University, Department of Computing Science, 23 September. • Turing Institute, Glasgow, 7 August. • Edinburgh University, Artificial Intelligence Department, 12 May. • Edinburgh University, Cognitive Science Department, 7 March. • University of Oxford, Programming Research Group, 21 February. • University of Cambridge, Computing Laboratory, 20 February. • Edinburgh University, Computer Science Department, 25 January.

1990 Chinese University of Hong Kong, Department of Computer Science, 11 December. • Glasgow University, Department of Computing Science, 29 October. • Edinburgh University, LFCS, 26 October. • St. Andrews University, Scotland, 25 October. • SRI International, 12, 14 March. • Stanford University, CA, 13 March.

1989 Univeristy of Cambridge, Cambridge, UK, 13 December. • Bristol University, Bristol, UK, 12 December. • IBM Research, Hawthorn NY, 7 September. • Swedish Institute of Computer Science, 18 May. • Carnegie Mellon University, 27 April. • ECRC, Munich, Germany, 7 March. • Siemans AG, Munich, Germany, 6 March. • University of Tübingen, Germany, 4 March. • University of Torino, Italy, 2 March. • University of Milano, Italy, 28 February and 1 March. • University of Pisa, Italy, 27 February. • IASI Rome, Italy, 21 February. • University of Rome, Italy, 20 February.

1988 Unisys, Paoli PA, 6 April. • INRIA, Rocquencourt France, 14 March. • University of Cambridge, Computer Laboratory, 9 March. • Imperial College, Computer Science Department, 8 March. • University of Edinburgh, Cognitive Science Department, 3 March. • University of Edinburgh, Computer Science Department, 2 March. • University of Edinburgh, Computer Science Department, 1 March. • University of Glasgow, Computer Science Department, 29 February.

1987 Digital Equipment Corporation, Hudson, MA, 13 October. • SUNY at Stony Brook, Computer Science Department, 18 September. • AT&T Bell Labs, Murray Hill, 12 February.

1986 Columbia University, Computer Science Department, 29 October. • Hong Kong University, Computer Science Department, 5 August. • University of Cambridge, Computer Science Laboratory, 23 July. • University of Edinburgh, Cognitive Science Department, 9 July. • Rutgers University, Computer Science Colloquium, 6 March. • Carnegie Mellon University, Logic Colloquium, 13 February. • MCC, Austin, Texas, 6 February.

1985 SDC Unisys, Paoli, PA, 12 December. • Electrotechnical Laboratory, Ibaraki Japan, 4 June. • Kyoto University, Kyoto Japan, 30 May. • Mid-Atlantic Logic Conference, Philadelphia, PA, 17 February.

1984 Hewlett-Packard, Palo Alto, CA, 23 January.

Conference and Workshop Program Committees

2018 IJCAR-2018: 9th International Joint Conference on Automated Reasoning, Oxford, 14-17 July 2018.

2017 FSCD'17: Second International Conference on Formal Structures for Computation and Deduction, Oxford, 3-6 September (Program Committee Chair). • 26th International Conference on Automated Deduction, Gothenburg, Sweden, 6-11 August.

2016 FSCD'16: First International Conference on Formal Structures for Computation and Deduction, Porto, Portugal, 22-26 June. • IJCAR 2016: International Joint Conference on Automated Reasoning, Ciombra, Portugal, 27 June - 2 July. • CPP 2016, Fifth International Conference on Certified Programs and Proofs, 18-19 January, Saint Petersburg, Florida.

2015 TABLEAUX 2015: Automated Reasoning with Analytic Tableaux and Related Methods, Wroclaw, Poland, September. • PPDP 2015: 17th International Symposium on Principles and Practice of Declarative Programming, Siena, Italy, 13-16 July. • PxTP 2015: Fourth Workshop on Proof eXchange for Theorem Proving, Berlin, Germany, 2-3 August. • ICALP 2015 (42nd International Colloquium on Automata, Languages, and Programming), Track B, Kyoto, Japan, 6-10 July.

2014 WoLLIC 2014: Workshop on Logic, Language, Information and Computation, Valparaiso Chile, 1-4 September. • Joint Meeting of the 23rd EACSL Annual Conference on Computer Science Logic (CSL14) and the 29th ACM/IEEE Symposium on Logic in Computer Science (LICS14), 14-18 July (Program Committee co-Chair).

2013 Tableaux 2013, 16-19 September, Nancy, France.

2012 CPP 2012: Second International Conference on Certified Programs and Proofs, 13-15 December, Kyoto, Japan (Program Committee co-Chair). • LFMTP'12: Workshop on Logical Frameworks and Meta-Languages: Theory and Practice, 9 September, Copenhagen, Denmark. • LAM 2012: Fifth International Workshop on Logics, Agents, and Mobility, June, Hamburg, Germany. • LPAR-18: The 18th International Conference on Logic for Programming, Artificial Intelligence and Reasoning. Merida, Venezuela, 11-15 March. • FICS 2012: Fixed Points in Computer Science (a satellite workshop of ETAPS 2012), Tallinn, Estonia, 24 March (Program Committee co-Chair). • IJCAR 2012: International Joint Conference on Automated Reasoning, Manchester, UK, June (Program Committee co-Chair).

2011 LAM 2011: Fourth International Workshop on Logics, Agents, and Mobility, 10 September, Aachen, Germany. • MLPA-11: Modules and Libraries for Proof Assistants, 26 August, Nijmegen. • LICS 2011: Logic in Computer Science, 21-24 June, Toronto. • Tableaux 2011: 20th International Conference on Automated Reasoning with Analytic Tableaux and Related Methods, July 4-8, Bern, Switzerland.

2010 LPAR-17: 17th International Conference on Logic for Programming Artificial Intelligence and Reasoning, Yogyakarta, Indonesia, 11-15 October. • Workshop on Proof Systems for Program Logics, FLoC 2010, Edinburgh, 10 July. • Workshop on Logics for Agents and Mobility, FLoC 2010, Edinburgh, 15 July. • Workshop on Proof-Search in Type Theories, FLoC 2010, Edinburgh, 15 July. • Workshop on Programming Languages for Mechanized Mathematics Systems (PLMMS), 5 July. • IFIP-TCS 2010: International Conference on Theoretical Computer Science, part of the World Computer Congress in Brisbane, 20-23 September.

2009 Workshop on Games, Dialogue and Interaction, 28-29 Sept, Université Paris 8. • LAM 2009: Logics for Agents and Mobility, August, Los Angeles. A workshop associated to LICS09. • GaLoP IV: Games for Logic and Programming Languages, 28 - 29 March, York, UK. • CSL 2009: 18th Annual Conference of the European Association for Computer Science Logic, 7-11 September, Coimbra, Portugal. • LSFA 2009: Fourth Logical and Semantic Frameworks, with Applications, part of RDP 2009, 28 June-3 July, Brasília, Brazil. • ICALP 09: International Colloquium on Automata, Languages and Programming, Rhodes, Greece, July.

2008 PPDP 2008: 10th International ACM SIGPLAN Symposium on Principles and Practice of Declarative Programming, Valencia, 15-17 July. • ESHOL 2008: Evaluation of Systems for Higher Order Logic, part of IJCAR 2008, Sydney, Australia, 10-15 August. • LAM 2008: Logics for Agents and Mobility Workshop, part of ESSLLI 2008, Hamburg, Germany, 4-15 August. • LSFA08: Third Workshop on Logical and Semantic Frameworks with Applications, Brazil. • CSL08: 17th Annual Conference of the European Association for Computer Science Logic, 15-20 September, Bertinoro, Italy. • TCS 2008: 5th IFIP International Conference on Theoretical Computer Science, August. • FOSSACS 2008: Foundations of Software Science and Computation Structures. Budapest, Spring. • FLOPS 2008: Ninth International Symposium on Functional and Logic Programming, 14-16 April, Ise, Japan.

2007 LFMTP'07: Workshop on Logical Frameworks and Meta-Languages: Theory and Practice, August, Bremem, Germany. • WoLLIC'07: Fourteenth Workshop on Logic, Language, Information and Computation, Rio de Janeiro, 2-5 July. • CADE-21: 21st Conference on Automated Deduction, 17 - 20 July Bremen, Germany.

2006 FSTTCS'06: Foundations of Software Technology and Theoretical Computer Science, Kolkata, India. 13-15 December. • LPAR-13: 13th International Conference on Logic for Programming Artificial Intelligence and Reasoning, Phnom Penh, Cambodia. 13-17 November. • LFMTP'06: Workshop on Logical Frameworks and Meta-Languages: Theory and Practice, 16 August. • TFIT'06: Taiwanese-French Conference on Information Technology, Nancy, France. 28-30 March. • Geocal Workshop on Logic Programming and Concurrency, 27 February - 3 March, CIRM, Luminy, France (Program Committee co-Chair)

2005 MoVeLog'05: A Workshop on Mobile Code Safety and Program Verification Using Computational Logic Tools. Barcelona, Spain, 5 October. • LPAR-11: 11th International Conference on Logic for Programming, Artificial Intelligence, and Reasoning. Montevideo, Uruguay, 14-18 March • CSL05: 14th Annual Conference of the European Association for Computer Science Logic, 22-25 August, Oxford, UK • CADE-20: Conference on Automated Deduction, Tallinn, Estonia, 22-27 July.

2004 ICLP'04: Twentieth International Conference on Logic Programming, Saint-Malo, France, 6-9 September. • LFM04: Fourth International Workshop on Logical Frameworks and Meta-Languages.

2003 ACM-Sigplan PPDP03: International Conference on Principles and Practice of Declarative Programming. Uppsala, Sweden. August. (Program Committee Chair). • DCFS 2003: 5th Workshop on Descriptional Complexity of Formal Systems, 12-14 July, Budapest, Hungary. • LPAR 2003: 10th International Conference on Logic for Programming Artificial Intelligence and Reasoning, 22-26 September, Almaty, Kazakhstan. • Merlin 2003: Mechanized Reasoning about Languages with Variable Binding, Uppsala, Sweden, August. • SBLP 2003: 7th Brazilian Symposium on Programming Langauges, Ouro Preto, Minas Gerais, Brazil, 28 - 30 May.

2002 DCFS02: Descriptional Complexity of Formal Systems, 4th Workshop, August 21 - 25, 2002, London, Ontario, Canada. • SBLP 2002: 6th Brazilian Symposium on Programming Langauges, PUC-Rio, Rio de Janeiro, 5-7 June. • PPDP02: International Conference on Principles and Practice of Declarative Programming. Pittsburgh, 6-8 October 2002. • CSL02: 11th Annual Conference of the European Association for Computer Science Logic, 22-25 September. • ICLP02: International Conference on Logic Programming, Copenhagen, 29 July - 2 August, part of FLOC 2002. • CADE02: Conference on Automated Deduction, Copenhagen, 29 July - 2 August, part of FLOC 2002. • LFM02: Logical Frameworks and Meta-languages.

2001 Dagstuhl Seminar on Proof Theory in Computer Science (01411), October 7-12. • ICoS3: Inference in Computational Semantics, 18-19 June. • FLOPS 2001: 5th International Symposium on Functional and Logic Programming, Waseda University, Tokyo, 7-9 March.

2000 CONCUR2000: 11th International Conference on Concurrency Theory, August 22-25, Pennsylvania State University. Conference co-Organizer and PC member. • ICoS-2: Inference in Computational Semantics, Dagstuhl, Germany, 29-30 July. • TABLEAUX'2000: the International Conference on Tableaux and Related Methods, University of St. Andrews, June.

1999 ICALP 99: International Colloquium on Automata, Languages and Programming, Prague, 11 – 15 July 1999. • TABLEAUX'99, the International Conference on Tableaux and Related Methods, Saratoga Springs, NY, June 1999. • ICLP'99: International Conference on Logic Programming, Las Cruces, New Mexico, November 1999.

1998 LICS 98: Logic in Computer Science, 21 - 24 June 1998, Indianapolis. • First Workshop on Component-Based Software Development in Computational Logic, Pisa, 14 (or 18) September.

1997 PLILP 97: International Conference on Programming Languages, Implementations, and Logic Programming, Southampton, UK, September. • ICLP 97: International Conference on Logic Programming, Sydney, Australia, 8-12 July. • CATS 97: Computing: The Australasian Theory Symposium, Sydney, Australia, 3-7 February.

1996 JICSLP 96: Joint International Conference and Symposium on Logic Programming, Bonn, Germany, November. • PLILP 96: International Conference on Programming Languages, Implementations, and Logic Programming, Aachen, Germany, September. • WELP'96: Workshop on Extensions to Logic Programming, 28 – 30 May, Leipzig, Germany.

1995 LICS 95: Logic in Computer Science, 25 – 29 June, San Diego, California.Portland Oregon, December. • ILPS 95: International Symposium on Logic Programming,

1994 POPL 94: The 21st Annual ACM SIGPLAN–SIGACT Symposium on Principles of Programming Languages, January. • ASL 94: Annual Meeting of the Association of Symbolic Logic, March, Gainsville Florida. • ICCL 94: International Conference on Constraints in Computational Logics, 7 – 9 September, Munich, Germany.

1993 LICS 93: Logic in Computer Science, 20 – 23 June, Montreal, Quebec. • LPAR 93: International Conference on Logic Programming and Automated Reasoning, St. Petersburg, July. • ILPS 93: International Symposium on Logic Programming, Vancouver, November (Program Committee Chair). • Linear Logic Workshop, Cornell University, June.

1992 JICSLP 92: Joint International Conference and Symposium on Logic Programming, Washington DC, November. • Workshop on Linear Logic and Logic Programming, 14 November (Program Committee Chair). • Workshop on the λProlog programming language, Philadelphia, August (Program Committee Chair). • LPAR 92: International Conference on Logic Programming and Automated Reasoning, St. Petersburg, July. • FGCS92: International Conference on Fifth Generation Computer Systems, 1992. Tokyo, Japan, 1 – 5 June. • META92: Third International Workshop on Meta-programming and Logic.

1990 CADE–10: Tenth International Conference on Automated Deduction, Kaiserslautern, Germany, 23 – 27 July. • Kleene'90: Third Logic Biennial, Bulgaria, 6 – 15 June. • Workshop on Structuring Disciplines for Logic Programming, 15 June, Eilat, Israel (Program Committee Chair). • META90: Second International Workshop on Meta-programming and Logic, April, Leuven, Belgium.

1989 ICLP89: Sixth International Conference on Logic Programming, August, Lisbon Portugal.

Editorial Duties

- *ACM Transactions on Computational Logic* (ToCL). Two term Editor-in-Chief (1 June 2009 – 30 June 2015). Area Editor for *Proof Theory* since 1999.
- *Journal of Automated Reasoning*, published by Springer. Member of Editorial Board since 2011.
- *Journal of Applied Logic*, published by Elsevier. Area editor for "Type Theory for Theorem Proving Systems" since 2003.
- *Theory and Practice of Logic Programming*, published by Cambridge University Press. Editorial Advisor from 1999 to 2015.
- *Journal of Logic and Computation*, published by Oxford University Press. Associate editor 1989 - 2012.
- *Logical Methods in Computer Science*, guest editor for a special issue on papers selected from CSL-LICS 2014.

Professional Duties

- LICS General Chair starting July 2018 for three years.
- Member of the LICS Steering Committee, starting 2012.
- Member of the LICS Organizing Board 2014 - 2015 and 1994 - 1997.
- Program committee chair for the 2nd International Conference on Formal Structures for Computation and Deduction (FSCD), Oxford, 3-6 September 2017.

- Member of an international review panel for the Distinguished Professor Grant at the Swedish Research Council, Fall 2017.
- Member of the FSCD Steering Committee, starting September 2017.
- Member of the EATCS Distinguished Dissertation Award Committee since March 2013.
- Member of the Ackermann Award Committee for 2016 - 2018. This award is given by EACSL for an outstanding doctoral dissertation in the field of Logic in Computer Science.
- Member of the 2012, 2016, 2017 Herbrand Award Committee of the Association for Automated Reasoning.
- Ex officio member of the Executive Committee of the ACM Special Interest Group on Logic and Compuation (SIGLOG), April 2014 – June 2016.
- Member of the SIGLOG advisory board, starting November 2015.
- Chair of the SIGLOG Executive Committee Nominating Committee, Fall 2015.
- Chair of the LICS 1995 Test-of-Time Award selection committee, August 2014 - July 2015.
- Program committee co-chair for the Joint Meeting of the 23rd EACSL Annual Conference on Computer Science Logic (CSL14) and the 29th ACM/IEEE Symposium on Logic in Computer Science (LICS14), July 2014 (Program Committee co-Chair).
- Expert Panel Member for the mid-term evaluation of Linnaeus Grants for Swedish research centers in the areas of Physical Sciences and Engineering, January 2014.
- Member of the selection jury for the 2011, 2012, and 2013 E. W. Beth Dissertation Award of the Association for Logic, Language and Information.
- Member of the CPP Steering Committee, since 2012.
- Panel member of the 2012 CASC Theorem Proving System Competition, Mancester, June 2012.
- Member of the FICS Workshop Steering Committee, since 2012.
- Program committee co-chair for CPP 2012: Second International Conference on Certified Programs and Proofs, 13-15 December, Kyoto, Japan.
- Organizer of the Special Session on Structural Proof Theory and Computing at the 2012 Annual Meeting of the Association of Symbolic Logic (ASL), Madison, Wisconsin, 31 March - 3 April 2012.
- Organizer of a panel on Proof Certificates at Certified Programs and Proofs (CPP), 7 December 2011, Kenting, Taiwan.
- Member of the TABLEAUX conference Steering Committee, 2011-2113.
- Member of the IJCAR (International Joint Conference of Automated Reasoning) Steering Committee, 2011-2112.
- Program committee co-chair for IJCAR 2012: International Joint Conference of Automated Reasoning, Manchester, UK, June 2012.
- Program Committee co-Chair for FICS 2012: Fixed Points in Computer Science (a satellite workshop of ETAPS 2012), Tallinn, Estonia.
- Member of a panel of experts charged with the evaluation of research at the University of Uppsala, Sweden, May 2011.
- Member of the "comité d'enseignement et recherche du Département d'Informatique de l'X (DIX)," starting October 2010.
- Member of the "comité de sélection sur le poste 27PR90 'Logique et vérification' à Rennes 1", May 2010.
- Member of the "comité de programmes," Digiteo, January 2010 - September 2011.
- Co-organizer of 2009 Workshop on Proof-Search in Type Theories (PSTT), 3 August 2009, a CADE 2009 affiliated workshop, Montreal, Canada.
- Inria Saclay hiring committee for CR2, Spring 2008.

- Program co-chair for the Geocal Workshop on Logic Programming and Concurrency, 27 Feb - 3 Mar 2005, CIRM, Luminy, France.
- Organizing Committee for MoVeLog'05: A Workshop on Mobile Code Safety and Program Verification Using Computational Logic Tools. An ICLP'05 Workshop, Barcelona, Spain, Oct. 5, 2005.
- Scientific Committee for the "Spring School on Security", Marseille, France, 25-29 April 2005.
- Elected twice to the Executive Council of the Association for Logic Programming: once for four years starting January 1991 and once for four years starting January 2005.
- Member of the "comite d'evaluation" of the PPS (Preuves, Programmes et Systemes) lab operated jointly by CNRS and University Paris 7, November 2003.
- Program Committee Chair for International Conference on Principles and Practice of Declarative Programming (PPDP 2003). Uppsala, Sweden. August 2003.
- Member of Concurrency Working Group during the Strategic Directions in Computer Research (SCDR), 14-15 June 1996, Boston. Sponsored by the ACM.
- Member of Steering committee for the International Conference on Principles and Practice of Declarative Programming (PPDP).
- Member of Working Group on Software Engineering and Programming Language, 12-13 June 1996, Boston. Sponsored by the NSF and Army Research Office.
- Tutorial Chair for CONCUR'95, Philadelphia, August 1995.
- Program Committee Chair for the International Symposium on Logic Programming, Vancouver, November 1993.
- Program Committee Chair for the Workshop on Linear Logic and Logic Programming, Washington DC, 14 November 1992.
- Program Committee Chair for the Workshop on the λProlog programming language, Philadelphia, August 1992.
- Program Committee Chair for the Workshop on Structuring Disciplines for Logic Programming, Eilat, Israel, 15 June 1990.

Distinctions

- LICS Test-of-Time Award 2014 for a paper appearing in LICS 1994.

- ERC Advanced Grant titled "ProofCert: Broad Spectrum Proof Certificates" for 2.2 million euros for the five years 2012-2016.

- LICS Test-of-Time Award 2011 for a paper co-authored with Joshua Hodas in LICS 1991.

- Finalist in the 33rd *Westinghouse Science Talent Search* (now the *Regeneron Science Talent Search*), 1974.

External Examiner

- External Examiner for PhDs after 2010: Sonia Marin, University of Paris-Saclay, 30 January 2018 (examinateur). • Raphaël Cauderlier, CNAM, 10 October 2016 (rapporteur). • Gabriel Scherer, University of Paris Diderot, 30 March 2016 (rapporteur). • Ali Assaf, École Polytechnique, 28 September 2015 (president). • Taus Brock-Nannestad, IT University of Copenhagen, 12 September 2014 (reporter). • Thanos Tsouanas, ENS Lyon, 2 July 2014 (rapporteur). • Mahfuza Farooque, École Polytechnique 19 December 2013. • Stéphane Zimmermann, University of Paris Diderot, 10 December 2013 (president). • Matthias Puech, University of Bologna, 8 April 2013 (rapporteur). • Robert Simmons, Carnegie Mellon University, 22 October 2012. • Nicolas Pouillard, University of Paris 7, 13 January 2012 (rapporteur). • Anders Starcke Henriksen, University of Copenhagen, December 2011 (reporter). • Francois Garillot, École Polytechnique, 5 December 2011 (president). • Daniel Weller, Technische Universität Wien, 12 January 2011 (reporter).

- External Examiner for PhDs during 2000-2010: • Elie Soubiran, École Polytechnique 27 September 2010 (president). • Clement Houtmann, Nancy, 12 March 2010 (examinateur). • Denis Cousineau, École Polytechnique, 1 Dec 2009 (examinateur). • Xiaochu Qi, Computer Science Department, University of Minnesota, 9 September 2009 (external examiner). • Andrew Gacek, Computer Science Department, University of Minnesota, 8 September 2009 (external examiner). • Samuel Mimram, Université Paris VII, 1 December 2008 (examinateur). • Paolo Di Giamberardino, University of Rome 3 and University of the Mediterranean, 18 April 2008 (examinateur). • Sébastien Briais, École Polytechnique Fédérale de Lausanne, 17 Dec 2007 (rapporteur). • Stéphane Lengrand, Université Paris VII & University of St Andrews, 8 Dec 2006 (examinateur). • Nicolas Oury, LRI, University of Paris Sud, 15 September 2006 (examinateur). • James Brotherston, LFCS, University of Edinburgh, 6 September 2006 (external examiner). • Gabriele Pulcini, University of Rome 3, 28 April 2006 (rapporteur). • Sylvain Salvati, Institut National Polytechnique de Lorraine, 13 June 2005 (examinateur). • Didier Le Botlan, École polytechnique, 6 May 2004 (examinateur). • Sorin Craciunescu, École polytechnique, March 2004 (rapporteur). • Kumar Neeraj Verma, LSV, ENS-Cachan, September 2003 (examinateur). • Kai Brünnler, Department of Computer Science, TU Dresden, September 2003. • Veronique Cortier, LSV, ENS-Cachan, March 2003 (rapporteur). • Remi Baudot, University of Paris 13, December 2000 (rapporteur). • Alberto Momigliano, Carnegie Mellon, July 2000.

- External Examiner for PhDs before 2000: • Ernie Ong, University of Western Australia, December 1997. • Alain Hui-Bon-Hoa, University of Paris VII, December 1997. • Giorgio Delzanno, University of Genoa, December 1996. • Alessio Guglielmi, Computer Science Department, Pisa, December 1995. • Keehang Kwon, Computer Science Department, Duke University, November 1994. • Scott Dietzen, School of Compter Science, Carnegie Mellon University, March 1992. • Francesca Arcelli, Dip. Scienze dell'Informazione, Universita' di Milano, July 1991. • Jean-Marc Andreoli, Thèse d'Informatique de l'Univeritè de Paris 6, France, June 1990. • Andrea Corradini, Computer Science Department, University of Pisa, January 1990. • Remo Pareschi, Cognitive Science Department, University of Edinburgh, March 1988. • Sanjay Manchanda, Department of Computer Science, State University of New York at Stony Brook, September 1987.

- Evaluation of Habilitation: Olivier Hermant, 20 April 2017 (reporter) • Stefan Hetzl, 5 November 2012 (reporter) • Frédéric Blanqui, 13 July 2012 (examiner and president) • Agata Ciabattoni, March 2007 (reporter) • Gilles Barthe, June 2004 (examiner) • Delia Kesner, Nov 2001 (reporter) • Jean-Marc Andreoli, May 2001 (reporter)

- External expert for the selection of a Professor in Theoretical Computer Science, Goteborg, Sweden.

- Member of a Review Panel (28 November 2006) for Graduate Schools and for Clusters of Excellence, Deutsche Forschungsgemeinschaft (German Research Foundation).

- Referee for Trinity College Fellowship Election, Cambridge.

- Research Initiation Awards panel for NSF.

- Reviewer of application for Senior Research Fellowship, EPSCR, UK.

Ph.D. Dissertation Supervision

- In progress: Ulysse Gérard, Matteo Manighetti.
- Roberto Blanco, "Applications for Foundational Proof Certificates in theorem proving", 21 December 2017, University of Paris-Saclay.
- Zakaria Chihani, "Certification of first-order proofs in classical and intuitionistic logics", 2 November 2015, Ecole Polytechnique.
- Ivan Gazeau, "Safe Programming in Finite Precision: Controlling Errors and Information Leaks", 14 October 2013, Ecole Polytechnique (co-advised with C. Palamidessi).

- Olivier Delande, "Symmetric Dialogue Games in the Proof Theory of Linear Logic," 15 October 2009, Ecole Polytechnique.
- Vivek Nigam, "Exploiting non-canonicity in the sequent calculus," 18 September 2009, Ecole Polytechnique. Fellow of the Alexander von Humboldt Scholarship.
- David Baelde, "A linear approach to the proof-theory of least and greatest fixed points," 9 December 2008, Ecole Polytechnique.
- Alexis Saurin, "Une étude logique du contrôle," 30 September 2008, Ecole Polytechnique. His thesis won the "Prix de thèse de l'Ecole Polytechnique" and the "Prix de thèse ASTI 2009".
- Alwen Tiu, "A Logical Framework for Reasoning about Logical Specifications," 15 March 2004, Pennsylvania State University.
- Jérémie Wajs, "Reasoning about logic programs using definitions and induction", 10 May 2002, Pennsylvania State University.
- Elaine Pimentel, "Linear logic as a framework for specifying sequent calculus" December 2001, Department of Computer Science, Universidade Federal de Minas Gerais, Brazil. Co-advised with Carlos Camarão de Figueiredo.
- Ray McDowell, "Reasoning in a Logic with Definitions and Induction," September 1997, University of Pennsylvania.
- Chuck Liang, "Object-language substitution and unification in meta-logic," September 1995, University of Pennsylvania.
- Jawahar Lal Chirimar, "Proof Theoretic Approach To Specification Languages," February 1995, University of Pennsylvania.
- Joshua Hodas, "Logic Programming in Intuitionistic Linear Logic: Theory, Design, and Implementation," August 1993, University of Pennsylvania.
- John Hannan, "Proof-theoretic methods for analysis of functional programs," August 1990, University of Pennsylvania.
- Amy Felty, "Implementing theorem provers in a higher-order logic programming language," August 1989, University of Pennsylvania.
- Gopalan Nadathur, "A higher-order logic as the basis for logic programming," December 1986, University of Pennsylvania.

Master's Thesis Supervision

- Jérémie Wajs, "Design and implementation of a theorem prover for operational semantics", May 2000.
- Alexander Betis, "Object Programming, Linear Logic and Java", December 1999.
- Joshua Hodas, "Object-Oriented Programming in Logic Programming," May 1990.
- Amy Felty, "Using extended tactics to do proof transformations," December 1986.
- Greg Hager, "Computational aspects of proofs in modal logic," December 1985.

Supervised Post Docs and Staff

- Noam Zeilberger, post doc ProofCert, from Oct 2015.
- Hugh Steele, post doc ProofCert, from 1 Dec 2015.
- Matthias Puech, post doc ProofCert, from Oct 2015.
- Tomer Libal, engineer ProofCert, from Jan 2015.
- Giselle Reis, post doc ProofCert, from Nov 2014 to Jul 2016.
- Marco Volpe, post doc ProofCert, from Nov 2014.
- Taus Brock-Nannestad, post doc ProofCert, from Oct 2014.
- Danko Ilik, post doc ProofCert, from Dec 2013.
- Matteo Cimini, post doc Inria, from Oct 2012 to Jan 2014.

- Fabien Renaud, post doc ProofCert, from Sep 2012 to Aug 2013.
- Quentin Heath, junior engineer at Inria, from Sep 2011 to Aug 2013.
- Beniamino Accattoli, post doc at Inria, from Sep 2011 to Aug 2012.
- Clément Houtmann, post doc at Inria, from Sep 2010 to Aug 2010.
- Andrew Gacek, post doc at Inria, from Oct 2009 to Sep 2010.
- Kaustuv Chaudhuri, post doc at Inria, from Oct 2006 to Sep 2007.
- Murdoch Gabbay, post doc at Inria, from July 2003 to July 2004.
- Kamal Aboul-Hosn, programmer and junior research assistant, Spring 2002.
- Philip Wickline, staff programming working on λProlog implementation for a year starting July 1995.
- Elsa Gunter, post doc from September 1987 to August 1988.

International Visitors Hosted at the Pennsylvania State University

- Alexis Saurin, Spring and Summer 2002. A five month research training period as part of his degree at the Ecole Normale Supérieure de Paris.
- Emmanuel Jeandel, Summer 2001. A ten-week research training period as part of his Master of Computer Science (Magistère d'Informatique et Modélisation) at the Ecole Normale Supérieure de Lyon.
- Elaine Pimentel, September 1999 - Feburary 2001. PhD student, Brazil.
- Luis Pinto, 28 August - 26 September 1998. Assistant Professor from the University of Minho, Portugal.
- Pablo Lopez, 7 September - December 3 1998. PhD student at the University of Malaga, Spain.

International Visitors Hosted at the Unversity of Pennsylvania

- Christian Urban, 9 May – 2 June 1996. PhD student from the University of St. Andrews, Scotland.
- Robert Stärk, January – June 1996. Post doc from Universität München traveling on a Swiss National Science Foundation grant.
- Giorgio Delzanno, 4 March – 25 May 1995. PhD student from the University of Genova.
- Ernesto Pimentel, 1 December 1994 – 28 February 1995. Professor from the University of Malaga.
- Catuscia Palamidessi, July – August 1994. Professor from the University of Genova.
- Alessio Guglielmi, 15 February – 30 May 1994. PhD student from the University of Pisa.
- Alain Hui-Bon-Hoa, 1 December 1992 – 30 March 1994. PhD student from the University Paris VII.
- Philippa Gardner, September – December 1992. PhD student from Edinburgh University.
- James Harland, January – February 1988. PhD student from Edinburgh University.
- Jean-Yves Girard, October – November 1987. Professor from the University Paris VI.

Publications

Books

1. *Programming with higher-order logic*, with Gopalan Nadathur, Cambridge University Press. June 2012. ISBN: 9780521879408.

Refereed Journal Publications

1. "Proof checking and logic programming". *Formal Aspects of Computing*, 29(3), 383-399 (May 2017).
2. "A semantic framework for proof evidence" with Zakaria Chihani and Fabien Renaud. *Journal of Automated Reasoning* 59(3): 287-330 (2017).
3. "A multi-focused proof system isomorphic to expansion proofs" with Kaustuv Chaudhuri and Stefan Hetzl. A special issue of the *J. of Logic and Computation* in honor of Roy Dyckhoff, 26(2): 577-603 (2016).
4. "Preserving differential privacy under finite-precision semantics" with Ivan Gazeau and Catuscia Palamidessi. TCS 655: 92-108 (2016).
5. "Abella: A System for Reasoning about Relational Specifications" with David Baelde, Kaustuv Chaudhuri, Andrew Gacek, Gopalan Nadathur, Alwen Tiu, and Yuting Wang. *J. of Formalized Reasoning*, 7(2), pp. 1-89 (2014).
6. "A formal framework for specifying sequent calculus proof systems" with Elaine Pimentel. *Theoretical Computer Science*, Vol. 474, pp. 98–116 (2013).
7. "Kripke Semantics and Proof Systems for Combining Intuitionistic Logic and Classical Logic" with Chuck Liang. *Annals of Pure and Applied Logic*, 164(2), pp. 86-111, February 2013.
8. "A two-level logic approach to reasoning about computations" with Andrew Gacek and Gopalan Nadathur. *Journal of Automated Reasoning*, 49(2) (2012), pp. 241-273.
9. "A Focused Approach to Combining Logics" with Chuck Liang. *Annals of Pure and Applied Logic*, 162 (2011), pp. 679-697.
10. "Nominal abstraction" with Andrew Gacek and Gopalan Nadathur. *Information & Computation*, 209, 2011, pp. 48-73.
11. "A framework for proof systems," with Vivek Nigam. *Journal of Automated Reasoning*, 45(2), 2010, pp. 157-188.
12. "Proof Search Specifications of Bisimulation and Modal Logic for the π-calculus", with Alwen Tiu. *ACM Transactions on Computational Logic*, 11(2), 2010.
13. "Proof and refutation in MALL as a game," with Olivier Delande and Alexis Saurin. *Annals of Pure and Applied Logic*, 161(5), February 2010, pp. 654-672.
14. "Focusing and Polarization in Linear, Intuitionistic, and Classical Logics," with Chuck Liang. *Theoretical Computer Science*, 410(46), 2009, pp. 4747-4768.
15. "A Proof Theory for Generic Judgments," with Alwen Tiu. *ACM Transactions on Computational Logic*, 6(4), October 2005, pp. 749–783.
16. "Encoding Transition Systems in Sequent Calculus," with Raymond McDowell and Catuscia Palamidessi. *Theoretical Computer Science*, 294(3), pp. 411-437 (2003).
17. "Reasoning with Higher-Order Abstract Syntax in a Logical Framework" with Raymond McDowell. *ACM Transactions on Computational Logic*, Vol. 3(1), 80-136 (2002).
18. "Cut-Elimination for a Logic with Definitions and Induction," with Raymond McDowell. *Theoretical Computer Science*, Vol. 232, pages 91 - 119 (2000).
19. "Foundational Aspects of Syntax," with Catuscia Palamidessi. *ACM Computing Surveys Symposium* 31(3es):11 (1999). Ed. by Pierpaolo Degano, Roberto Gorrieri, Alberto Marchetti-Spaccamela, and Peter Wegner.

20. "Forum: A multiple-conclusion specification logic". *Theoretical Computer Science*, 165(1): 201-232 (1996).
21. "Logic programming in a fragment of intuitionistic linear logic," with Joshua Hodas. *Information and Computation*, 110(2), 327-365 (1994).
22. "From operational semantics to abstract machines" with John Hannan. *Mathematical Structures in Computer Science*, 2(4), 415 – 459 (1992).
23. "Unification under a mixed prefix." *J. of Symbolic Computation*, Vol. 14, 321 – 358 (1992).
24. "A logic programming language with lambda-abstraction, function variables, and simple unification," *J. of Logic and Computation*, 1(4), 497 – 536 (1991).
25. "Uniform proofs as a foundation for logic programming" with Gopalan Nadathur, Frank Pfenning, and Andre Scedrov, *Annals of Pure and Applied Logic*, Vol. 51, 125 – 157 (1991).
26. "Higher-order Horn clauses" with Gopalan Nadathur, *J. of the ACM*, 37(4), 777 – 814 (1990).
27. "A logical analysis of modules in logic programming," *J. of Logic Programming*, 6 (1989), 79 – 108. Translated to Russian and reprinted in *Mathematical Logic in Programming*, edited by Y. I. Janov, M. V. Zakhar'yashchev, and A. Voronkov (Mir Publishers, USSR, 233 – 273 (1991)).
28. "A compact representation of proofs," *Studia Logica*, 46(4), 345 – 368 (1987).

Refereed Conference and Workshop Publications

1. "Influences between logic programming and proof theory". To be presented at HaPoP 2018: Fourth Symposium on the History and Philosophy of Programming, Oxford, 22 March 2018.
2. "Using linear logic and proof theory to unify computational logic". Proceedings of TLLA 2017: Trends in Linear Logic and Applications. Oxford, 3 September 2017.
3. "Separating Functional Computation from Relations" with Ulysse Gérard. Proceedings of CSL 2017. Stockholm, Sweden, 2017.
4. "Translating between implicit and explicit versions of proof" with Roberto Blanco and Zak Chihani. Proceedings of CADE-26, 255-273. Gothenburg, Sweden, 2017.
5. "A focused framework for emulating modal proof systems" with Sonia Marin and Marco Volpe. Proceedings of AiML 2016: Advances in Modal Logic. Budapest, 2016.
6. "Proof Certificates for Equality Reasoning" with Zakaria Chihani. Post-proceedings of LSFA 2015: 10th Workshop on Logical and Semantic Frameworks, with Applications. Natal, Brazil. ENTCS 322, pp. 93-108. 2016.
7. "Functions-as-constructors Higher-order Unification" with Tomer Libal. Proceedings of Formal Structures for Computation and Deduction 2016. LIPIcs Vol 52, 26:1–26:17.
8. "Proof Outlines as Proof Certificates: a system description" with Roberto Blanco. Proceedings of the First International Workshop on Focusing, 23 November 2015, Suva, Fiji. EPTCS vol 197.
9. "On Subexponentials, Synthetic Connectives, and Multi-Level Delimited Control" with Chuck Liang. Proceedings of LPAR-20: International Conference on Logic for Programming, Artificial Intelligence, and Reasoning, Nov 2015, Fiji.
10. "Focused labeled proof systems for modal logic" with Marco Volpe. Proceedings of LPAR-20: International Conference on Logic for Programming, Artificial Intelligence, and Reasoning, Nov 2015, Fiji.
11. "A framework for proof certificates in finite state exploration" with Quentin Heath. In the Proceedings of PxTP 2015: the Fourth Workshop on Proof eXchange for Theorem Proving, pp. 11-26.
12. "Proof Checking and Logic Programming" by Dale Miller. Invited talk. In the Proceedings of PPDP 2015: International Conference on Principles and Practice of Declarative Programming, edited by Elvira Albert, p. 18.
13. "Foundational Proof Certificates". In the Proceedings of APPA2014: All about Proofs, Proofs for All, edited by D. Delahaye and B. Woltzenlogel Paleo, pp. 150-163 (College Publications, 2015).

14. "A lightweight formalization of the metatheory of bisimulation-up-to" with Kaustuv Chaudhuri and Matteo Cimini. Proceedings of CPP 2015: The 4th ACM-SIGPLAN Conference on Certified Programs and Proofs. Mumbai, India, January 13 - 14, 2015, pp. 157-166.

15. "Communicating and trusting proofs: The case for foundational proof certificates." Proceedings of the 14th Congress of Logic, Methodology and Philosophy of Science in Nancy, France, 19-26 July 2011. Edited by P. Schroeder-Heister, W. Hodges, G. Heinzmann, and P. E. Bour, pp. 323-342. Published by College Publications, 2014.

16. "Extracting Proofs from Tabled Proof Search" with Alwen Tui. CPP 2013: Certified Programs and Proofs, Springer LNCS 8307, pp. 194–210, December 2013.

17. "Unifying Classical and Intuitionistic Logics for Computational Control" with Chuck Liang. Proceedings of LICS 2013: 28th Symp. on Logic in Computer Science.

18. "Checking foundational proof certificates for first-order logic (extended abstract)" with Zakaria Chihani and Fabien Renaud. PxTP 2014: Workshop on Proof Exchange for Theorem Proving, 9-10 June 2013, Lake Placid, USA.

19. "Foundational proof certificates in first-order logic" with Zakaria Chihani and Fabien Renaud. CADE 24: Conference on Automated Deduction, Ed. M. P. Bonacina. Springer LNAI 7898, pp. 162–177.

20. "A Systematic Approach to Canonicity in the Classical Sequent Calculus" with Kaustuv Chaudhuri and Stefan Hetzl. CSL 2012: Computer Science Logic, 3-6 September 2012, Fontainebleau, France.

21. "A non-local method for robustness analysis of floating point programs" with Ivan Gazeau and Catuscia Palamidessi. QAPL 2012: Tenth Workshop on Quantitative Aspects of Programming Languages, 31 March - 1 April 2012, Tallinn, Estonia. EPTCS 85, pp. 63–76.

22. "A proposal for broad spectrum proof certificates." CPP 2011: First International Conference on Certified Proofs and Programs, 7-9 December 2011, Taiwan, December 2011. LNCS 7086, pp. 54-69.

23. "Reasoning about computations using two-levels of logic." APLAS 2010: Eighth Asian Symposium on Programming Languages and Systems, Shanghai Jiao Tong University, China, 28 November - 1 December 2010. LNCS 6461, pp. 34-46.

24. "Focused inductive theorem proving," with David Baelde and Zachary Snow. IJCAR: International Joint Conference on Automated Reasoning, July 2010, Edinburgh. LNCS 6173, pp. 278-292.

25. "Finding Unity in Computational Logic." ACM-BCS Visions of Computer Science 2010 conference, 13-16 April 2010.

26. "Algorithmic specifications in linear logic with subexponentials," with Vivek Nigam. PPDP 2009: International Conference on Principles and Practice of Declarative Programming, pp. 129–140, Coimbra, Portugal, 7-9 September 2009.

27. "A Unified Sequent Calculus for Focused Proofs," with Chuck Liang. LICS 2009: 24th Symp. on Logic in Computer Science, June 2008, pp. 355–364, Los Angeles, 11-14 August 2009.

28. "Reasoning in Abella about Structural Operational Semantics Specifications," with Andrew Gacek and Gopalan Nadathur. LFMTP 2008: International Workshop on Logical Frameworks and Meta-Languages: Theory and Practice, Pittsburgh, June 2008, pp. 75–89.

29. "Canonical Sequent Proofs via Multi-Focusing," with Kaustuv Chaudhuri and Alexis Saurin. Proceedings of the IFIP International Conference on Theoretical Computer Science, September 2008, pp. 383–396.

30. "Focusing in linear meta-logic," with Vivek Nigam. Proceedings of IJCAR 2008: International Joint Conference on Automated Reasoning, Sydney, August 2008, LNCS 5195, pp. 507–522.

31. "A neutral approach to proof and refutation in MALL," with Olivier Delande. LICS 2008: 23th Symp. on Logic in Computer Science, June 2008, pp. 498–508.

32. "Combining generic judgments with recursive definitions," with Andrew Gacek and Gopalan Nadathur. LICS 2008: 23th Symp. on Logic in Computer Science, June 2008, pp. 33–44.

33. "Least and greatest fixed points in linear logic" with David Baelde. LPAR 2007: International Conference on Logic for Programming and Automated Reasoning, LNCS 4790, pp. 92-106.

34. "Focusing and Polarization in Intuitionistic Logic" with Chuck Liang. CSL07: Computer Science Logic 2007. LNCS 4646, pp. 451-465.

35. "Incorporating tables into proofs" with Vivek Nigam. CSL07: Computer Science Logic 2007. LNCS 4646, pp. 466-480.

36. "From proofs to focused proofs: a modular proof of focalization in Linear Logic" with Alexis Saurin. CSL07: Computer Science Logic 2007. LNCS 4646, pp. 405-419.

37. "The Bedwyr system for model checking over syntactic expressions" with David Baelde, Andrew Gacek, Gopalan Nadathur, and Alwen Tiu. A system description in CADE21: Conference on Automated Deduction 2007. LNAI 4603, 391-397.

38. "Representing and reasoning with operational semantics." Proceedings of IJCAR'06 (Third International Joint Conference on Automated Reasoning), 17 - 20 August 2006, Seattle.

39. "Collection analysis for Horn clause programs.". Proceedings of the Eighth ACM-SIGPLAN International Symposium on Principles and Practice of Declarative Programming (PPDP'06), Venice, Italy, 10-12 July 2006

40. "Mixing Finite Success and Finite Failure in an Automated Prover," with Alwen Tiu and Gopalan Nadathur. Proceedings of ESHOL'05: Empirically Successful Automated Reasoning in Higher-Order Logics, December 2005.

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59. "Unification of Simply Typed Lambda-Terms as Logic Programming," in the Proc. of the 1991 International Conference on Logic Programming, edited by Koichi Furukawa, June 1991.

60. "Extending Definite Clause Grammars with Scoping Constructs" with Remo Pareschi, in the Proc. of the 1990 International Conference in Logic Programming, edited by D. H. D. Warren and Peter Szeredi, 373 – 389.

61. "Representing Objects in a Logic Programming Language with Scoping Constructs" with Joshua Hodas, in the Proc. of the 1990 International Conference in Logic Programming, edited by D. H. D. Warren and Peter Szeredi, 511 – 526.

62. "From Operational Semantics to Abstract Machines: Preliminary Results" with John Hannan, the Proc. of the 1990 Lisp and Functional Programming Conference, edited by M. Wand, 323 – 332.

63. "Encoding a Dependent-Type λ-Calculus in a Logic Programming Language" with Amy Felty, the 1990 Conference on Automated Deduction, Springer-Verlag Lecture Notes in Artificial Intelligence, Volume 449, edited by Mark Stickel, 221–235.

64. "A Logic Programming Language with Lambda-Abstraction, Function Variables, and Simple Unification" in *Extensions of Logic Programming* ed. Peter Schroeder-Heister, Springer-Verlag, Lecture Notes in Artificial Intelligence 475, December 1989, 253 – 281.

65. "Lexical Scoping as Universal Quantification" in the Sixth International Logic Programming Conference, eds. G. Levi and M. Martelli, Lisbon, Portugal, June 1989, 268 – 283.

66. "Uses of higher-order unification for implementing program transformers" with John Hannan, Fifth Symposium on Logic Programming, ed. by Kenneth A. Bowen and Robert A. Kowalski, MIT Press, August 1988, Seattle, Washington, 942 – 959.

67. "An overview of λProlog" with Gopalan Nadathur, Fifth Symposium on Logic Programming, ed. by Kenneth A. Bowen and Robert A. Kowalski, August 1988, Seattle, Washington, 810 – 827.

68. "Specifying theorem provers in a higher-order logic programming language" with Amy Felty, 9th International Conference on Automated Deduction, ed. Ewing Lusk and Ross Overbeck, Argonne, IL, May 1988, 61 – 80.

69. "A logic programming approach to manipulating formulas and programs" with Gopalan Nadathur, IEEE Symposium on Logic Programming, San Francisco, September 1987, Program Chair Seif Haridi, 379 – 388.

70. "Hereditary Harrop formulas and uniform proofs systems" with Gopalan Nadathur and Andre Scedrov, Second Annual Symposium on Logic in Computer Science, Program Chair David Gries, Cornell University, June 1987, 98 – 105.

71. "A theory of modules for logic programming," IEEE Symposium on Logic Programming, Salt Lake City, September 1986, Program Chair Robert M. Keller, 106 – 114.

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72. "An integration of resolution and natural deduction theorem proving" with Amy Felty, National Conference on Artificial Intelligence, Philadelphia, August 1986, Program Co-Chairs Tom Kehler and Stan Rosenschein, 198 – 202.

73. "Higher-order logic programming" with Gopalan Nadathur, Proc. of the Third International Logic Programming Conference, edited by Ehud Shapiro, London, June 1986, 448 – 462.

74. "Some uses of higher-order logic in computational linguistics" with Gopalan Nadathur, 24th Annual Meeting of the Association for Computational Linguistics, New York, June 1986, 247 – 255.

75. "Expansion tree proofs and their conversion to natural deduction proofs," the 7th Conference on Automated Deduction, edited by R. E. Shostak, Lecture Notes in Computer Science, No. 170, Springer-Verlag, 1984, 375 – 393.

76. "A look at TPS" with P. B. Andrews, Eve L. Cohen, 6th Conference on Automated Deduction, edited by Donald W. Loveland, Lecture Notes in Computer Science, No. 138, Springer-Verlag, 1982, 50 – 69.

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1. Proc. of the 2nd International Conference on Formal Structures for Computation and Deduction, FSCD 2017, 2-9 September 2017, Oxford, UK. Edited by Dale Miller. Published by LIPIcs. ISBN 978-3-95977-047-7. DOI 10.4230/LIPIcs.FSCD.2017.0.

2. Proc. of the Joint Meeting of the Twenty-Third EACSL Annual Conference on Computer Science Logic (CSL) and the Twenty-Ninth Annual ACM/IEEE Symposium on Logic in Computer Science (LICS), CSL-LICS 2014, 14-18 July 2014, Vienna, Austria. Edited by Thomas Henzinger and Dale Miller. Published by the ACM. ISBN 978-1-4503-2886-9.

3. Proc. of the 2nd International Conference on Certified Programs and Proofs, CPP 2012, 13-15 December, Kyoto, Japan. Edited by Chris Hawblitzel and Dale Miller. Published by Springer as LNCS 7679.

4. Automated Reasoning: 6th International Joint Conference, IJCAR 2012, Manchester, UK, June 2012, Proceedings. Edited by Bernhard Gramlich, Dale Miller, and Uli Sattler. Published by Springer as LNAI 7364.

5. Proc. of the 8th Workshop on Fixed Points in Computer Science, FICS 2012. Edited by Dale Miller and Zoltán Ésik. Published as EPTCS 77, Feb 2012.

6. Proc. of the 2003 International Conference on Principles and Practice of Declarative Programming, PPDP 2003. Edited by Dale Miller. Published by the ACM.

7. Logic Programming, Proceedings of the 1993 International Symposium, edited by Dale Miller. Vancouver, British Columbia, Canada, October 26-29, 1993. MIT Press 1993, ISBN 0-262-63152-0.

8. Proc. of the Workshop on Linear Logic and Logic Programming, Washington, DC, November 1992. Edited by Dale Miller. Available as UPenn CIS technical report MS-CIS-92-80.

9. Proc. of the Workshop on the λProlog Programming Language, University of Pennsylvania, July 1992. Edited by Dale Miller. Available as UPenn CIS technical report MS-CIS-92-86.

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2. "A Proof-Theoretic Approach to the Static Analysis of Logic Programs" in *Reasoning in Simple Type Theory: Festschrift in honour of Peter B. Andrews on his 70th birthday*. Edited by Christoph Benzmüller, Chad E. Brown, Jörg Siekmann, and Richard Statman, *Studies in Logic*, published by College Publications, December 2008.

3. "Overview of linear logic programming" in *Linear Logic in Computer Science*, edited by Thomas Ehrhard, Jean-Yves Girard, Paul Ruet, and Phil Scott. Cambridge University Press, London Mathematical Society Lecture Notes Series, volume 316 (2004).

4. "Sequent Calculus and the Specification of Computation" in *Computational Logic*, edited by U. Berger and H. Schwichtenberg. NATO Advanced Science Institute Series, sub-series F: Computer and Systems Science, Springer, 399 – 444. Taken from lectures given at the International Summer School Marktoberdorf on Logic of Computation, 29 July - 10 August 1997.

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7. "Abstractions in logic programming," in *Logic and Computer Science*, edited by Pieirgiorgio Odifreddi, Academic Press (APIC Series 31) 1990, 329 – 359.

8. "A Meta-Language for Functional Programming" with John Hannan, in *Meta-Programming in Logic Programming*, edited by H. Abramson and M. Rogers, MIT Press, Chapter 24, 1989, 453 – 476.

9. "Automating higher order logic" with Peter B. Andrews, Eve Longini Cohen, and Frank Pfenning, in *Automated Theorem Proving: After 25 Years*, ed. W. W. Bledsoe and D. W. Loveland, AMS, 1984, 169 – 192.

Papers in Other Proceedings

1. "Observations about using logic as a specification language," invited paper to the 1995 Gulp-Prode Joint Conference on Declarative Programming, Salerno, Italy, 11 – 14 September 1995.

2. "A Proposal for Modules for λProlog: Preliminary Draft," Proc. of the 1992 λProlog Workshop, August 1992.

3. "Abstract Syntax and Logic Programming," Proc. of the First and Second Russian Conferences on Logic Programming, September 1991, St. Petersburg, LNAI Series, Springer-Verlag.

4. "A Meta Language for Type Checking and Inference: An Extended Abstract," with Amy Felty, Proc. of the 1989 Workshop on Programming Logic, Bålstad, Sweden.

5. "Deriving mixed evaluation from standard evaluation for a simple functional programming language," with John Hannan, 1989 International Conference on Mathematics of Program Construction, Program Chair Jan L. A. van de Snepscheut, Springer-Verlag, LNCS 375, 239 – 255.

6. "A computational logic approach to syntax and semantics," with Gopalan Nadathur. Invited submission for the Tenth Symposium of the Mathematical Foundations of Computer Science, IBM Japan, May 1985.

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1. Three entries—titled "Expansion Proofs", "Focused LK", and "Focused LJ"—in *Towards an Encyclopaedia of Proof Systems*, edited by Bruno Woltzenlogel Paleo, January 2017.

2. "Linear Logic" with Roberto DiCosmo. The Stanford Encyclopedia of Philosophy (Fall 2006 Edition), Edward N. Zalta (ed.).

3. "Logic, Higher-order," article for the Second Edition of the Encyclopedia of Artificial Intelligence, ed. S. Shapiro, 1992.

Newsletters and Bulletins

1. "Formalizing operational semantic specifications in logic." Concurrency Column of the Bulletin of the European Association for Theoretical Computer Science (EATCS), October 2008.
2. "Logic and Logic Programming: A Personal Account", ALP Newsletter, February 2006, 19(1).
3. "A Survey of Linear Logic Programming". Computational Logic: The Newsletter of the European Network in Computational Logic, Volume 2, No. 2, December 1995, pp. 63 - 67.
4. "Proof Theory as an Alternative to Model Theory," guest editorial for the Newsletter of the ALP, August 1991.

Published Reviews

1. Review of *Advances in Linear Logic*, edited by Jean-Yves Girard, Yves Lafont, Laurent Regnier. J. of Symbolic Logic, 62 (2) 1997, pages 678-680.
2. Review of *Invariants, composition, and substitution*, by Ekkart Kindler, *Acta Inf.* **4** (June 1995), 299-312. Computing Reviews, September 1996.
3. Review of *A computational logic* and *A computational logic handbook* by Robert Boyer and J. Strother Moore, Journal of Symbolic Logic, September 1990, 1302 – 1304.
4. Review of *The art of Prolog: advanced programming techniques*, by Leon Sterling and Ehud Shapiro. Computing Reviews, 349 – 350, July 1987.
5. Review of "Constructive mathematics as a programming logic I: some principles of theory" by Robert Constable. Computing Reviews, April 1987, 213 – 214.

Miscellaneous

1. "An Extension to ML to Handle Bound Variables in Data Structures," in the Proc. of the Logical Frameworks BRA Workshop, May 1990.
2. "Hereditary Harrop formulas and logic programming," Proc. of the VIII International Congress of Logic, Methodology, and Philosophy of Science, Moscow, August 1987 (abstract).
3. "Higher-order logic programming," Journal of Symbolic Logic 51(3), p. 851, 1986 (abstract). Talk presented at the meeting on Logic, Language, and Computation, 18 July 1985, Stanford University.
4. "Expansion tree proofs in higher-order logic," Journal of Symbolic Logic 49(4), 1984, 1443 – 1444 (abstract). Talk given at the Annual Meeting of the Association for Symbolic Logic, 30 December 1983, Boston.
5. "The sum of an integer's digits: some properties," *Journal of Undergraduate Mathematics*, September 1976, Vol. 8, 61 – 64.

Departmental and University Service at Penn State

- Promotion and Tenure Committee, CSE, 2001-2.
- Strategic Committee, CSE, 2001-2.
- Department Head of Computer Science and Engineering, September 1997 to August 2001.
- Coordinating Council for IST, 1999.
- Search Committee for the Dean of the School for IST, 1998.
- Building Selection Committee for the new IST/CSE Building, August 1999 to August 2001.
- CoE United Way Committee, 1999/2000.
- Member of the Information Science and Technology Strategic Planning Group, 1997/98.
- Member of the College of Engineering Task Force on Faculty Release Time, Cost Sharing and Overhead, 1997/98.
- Member of the Staff Grade Review Committee, College of Engineering, Fall 1999.

Departmental and University Service at UPenn

- Selected for a Faculty Service Award in the CIS Department at Penn, June 1994.
- Written Preliminary Exam I organizing committee, 1991, 1992, 1993 (chair one year).
- CIS Colloquium organizer, 1991, 1992, 1993, 1994, 1995.
- Committee on Mathematics Course Offerings in SEAS, 1991, 1992.
- Secretary of the CIS Faculty, one year.
- CIS Graduate Admissions Committee, several years.
- The Computer Science coordinator of the Logic and Computation Seminar, four years.
- Undergraduate curriculum committee, two years.
- I have supervised 15 graduate students in independent study courses, in the areas of algebra, logic, type theory, theorem proving, denotational semantics, and complexity theory. These have been students that I did not otherwise advise on research.
- I have supervised twelve senior project students.
- I have served on the PhD committee of at least 15 students at Penn, as well as at least 10 committees for the Written Preliminary Exams Part II.
- Member of the Task Force for the Future of Computing at Carnegie Mellon University, chaired by Allen Newell, 1982.

Courses Taught at MPRI: Master Parisien de Recherche en Informatique

- Master level course MPRI 2-1 "Logique linéaire et paradigmes logiques du calcul", 2005-2016.

Courses Taught at Ecole polytechnique

- INF 431: Informatique Fondamentale (Petit Class), Spring 2003, 2004, 2005, 2006.
- INF 542: Automates, langages, calculabilité (Petit Class), Winter 2003, 2004, 2005, 2006.
- INF 585: Logics for Computer Science, Spring 2004, 2005, 2006.

Courses Taught at Penn State

- CSE 598A, Logic Programming: Advance features and applications, Fall 00.
- CSE 428, Programming Language Concepts, Spring 00, 02.
- CSE 260, Discrete Mathematics for Computer Science, Fall 00.
- CSE 597a, Program Analysis Seminar, Fall 00.
- CSE 522, Semantics of Programming Languages, Spring 00.
- CSE 468, Theory of Automata, Languages, and Computability. Spring 99.

Courses Taught at UPenn

- CSE 120, Programming Languages and Techniques I, Fall 1993, Fall 1995
- CSE 220, Design and Analysis of Algorithms, Spring 1986, 1990.
- CSE 260, Mathematical Foundations of Computer Science I, Fall 1983, 1984, 1985.
- CSE 261, Mathematical Foundations of Computer Science II, Spring 1992.
- CSE 360, Logic and Computation, Spring 1994, Spring 1995.
- CSE 400/401, Senior Projects, Spring 1988, Fall 1988.
- CIS 500, Programming Languages and Techniques, Fall 1986, 1988, 1989.
- ENGM 504, Logic and Computation in Algebra, Spring 1992, 1994, 1996, Fall 1994, 1995.
- CIS 578, Algebra for Computer Science, Fall 1986, 1987.
- Seminar in Computational Logic, Spring 1986.
- Seminar in Logic for Logic Programming, Spring 1985.
- Seminar in Automatic Theorem Proving, Spring 1984.