

Curriculum Vitæ

Poteaux Adrien

Born on June 21st, 1982 in Amiens (80), France

Home Address

1082 rue de Fréchy

59310 Saméon, France

URL : <http://www.lifl.fr/~poteaux/>

Business Address

Laboratoire d'Informatique Fondamentale de Lille

Université de Lille

Cité scientifique

59655 Villeneuve d'Ascq, France

Tél. : +33-3 20 33 77 10

e-mail : adrien.poteaux@lifl.fr

Research

2011-now Associate professor in the CFHP team in the CRISTAL lab of the university of Lille

2010-2011 Post-doc position in the team project SALSA (UPMC/INRIA) in the computer science department of the university Paris 6 (LIP6); part of the ANR Exacta project.

2009-2010 Post-doc position at the Johannes Kepler University (department of Applied Geometry) from September 2009 to August 2010. Member of the european project SAGA.

2008-2009 Post-doc position at the University of Western Ontario (Symbolic Computation Lab) from April 2009 to July 2009.

Post-doc position at the University of Nice from September 2008 to March 2009. Member of the project Galaad of INRIA Sophia Antipolis.

2004-2008 PhD student (grant from the French Education and Research Ministry) at the university of Limoges. Part of the CANSO team, of the XLIM lab (UMR CNRS 6172)

Teaching

2011-now Associate professor at the university of Lille. 192h in computer science per year.

2010-2011 Vacations at the university Pierre and Marie Curie.
36h of practical work in the computer science department.

2007-2008 ATER (temporary research and teaching position) at the university of Limoges.
96h in the departement of Mathematics.

2004-2007 *Moniteur* at the university of Limoges. 3*64h in the departement of Mathematics.

Education

2008 PhD Thesis in Mathematics, University of Limoges, France

Title : *Computing Puiseux Expansions and Application to the Computation of the Monodromy Group of a Plane Algebraic Curve.*

Supervised by Marc Rybowicz and Moulay Barkatou; defended on October, 15th, 2008

2004 Master of Cryptography, Code and Mathematics computations *cum laude*,
University of Limoges. Internship with Manuel Bronstein (INRIA Sophia Antipolis).
about : *Integration of Algebraic Functions, the logarithmic part*

2002 Bachelor's degree in Mathematics, *summa cum laude*,
University of Limoges.

Publications

- ▶ *Improving Complexity Bounds for the Computation of Puiseux Series over Finite Fields*, with M. Rybowicz.
Proceedings ISSAC'15, 299-306, ACM Press, 2015.
- ▶ *An Algorithm for Converting Nonlinear Differential Equations to Integral Equations with an Application to Parameter Estimation from Noisy Data*, with François Boulier, Anja Korpöral, François Lemaire, Wilfrid Perruquetti, Rosane Ushirobira.
Proceedings of CASC'14, 28-43, LNCS 8660, 2014.
- ▶ *On the complexity of Computing with Zero-dimensional Triangular Sets*, with É Schost.
Journal of Symbolic Computation 50 : 110-138, 2013.
- ▶ *Modular Composition modulo Triangular Sets and Applications*, with É. Schost.
Computational Complexity 22 : 463-516, 2013.
- ▶ *Approximate implicitization of curves and surfaces* with M. Aigner, B. Jüttler
Book chapter of *Numerical and Symbolic Scientific Computing*, 1-19, Springer Vienna, 2012.
- ▶ *Good Reduction of Puiseux Series and Applications*, with M. Rybowicz.
Journal of Symbolic Computation, 47(1) : 32-63, 2012.
- ▶ *Complexity Bounds for the rational Newton-Puiseux Algorithm over Finite Fields*, with M. Rybowicz.
Applicable Algebra in Engineering, Communication and Computing, 22(3), 187-217, 2011.
- ▶ *Computing Monodromy via Continuation Methods on Random Riemann Surfaces*, with A. Galligo.
Theoretical Computer Science, 412(16) : 1492-1507, 2011.
- ▶ *Hierarchical Spline Approximation of the Signed Distance Function*, with X. Song, B. Jüttler.
Proceedings SMI'10, 241-245, IEEE Press, 2010.
- ▶ *Continuations and Monodromy on random Riemann Surfaces*, with A. Galligo
Proceedings SNC'09, 115-124, ACM Press, 2009.
- ▶ *On the good reduction of Puiseux series and the complexity of Newton-Puiseux algorithm over finite fields*, with M. Rybowicz.
Proceedings ISSAC'08, 239-246, ACM Press, 2008.
- ▶ *Computing Monodromy Groups defined by Plane Algebraic Curves*.
Proceedings SNC'07, 36-45, ACM Press, 2007.