Marie-FranÃ§oise Roy

List of Publications by Year
in descending order

22 papers	**982** citations	933447 **10** h-index	794594 **19** g-index
24 all docs	**24** docs citations	**24** times ranked	**416** citing authors

#	Article	IF	Citations
1	On the combinatorial and algebraic complexity of quantifier elimination. Journal of the ACM, 1996, 43, 1002-1045.	2.2	251
2	Sylvester–Habicht Sequences and Fast Cauchy Index Computation. Journal of Symbolic Computation, 2001, 31, 315-341.	0.8	56
3	Computing roadmaps of semi-algebraic sets on a variety. Journal of the American Mathematical Society, 2000, 13, 55-82.	3.9	50
4	On the number of cells defined by a family of polynomials on a variety. Mathematika, 1996, 43, 120-126.	0.5	40
5	Description of the connected components of a semialgebraic set in single exponential time. Discrete and Computational Geometry, 1994, 11, 121-140.	0.6	28
6	A Baby Step–Giant Step Roadmap Algorithm for General Algebraic Sets. Foundations of Computational Mathematics, 2014, 14, 1117-1172.	2.5	27
7	On the Betti numbers of sign conditions. Proceedings of the American Mathematical Society, 2005, 133, 965-974.	0.8	17
8	Divide and Conquer Roadmap for Algebraic Sets. Discrete and Computational Geometry, 2014, 52, 278-343.	0.6	15
9	Computing the First Betti Number of a Semi-Algebraic Set. Foundations of Computational Mathematics, 2008, 8, 97-136.	2.5	14
10	Bounding the radii of balls meeting every connected component of semi-algebraic sets. Journal of Symbolic Computation, 2010, 45, 1270-1279.	0.8	10
11	Bounding the Betti numbers and computing the Euler–Poincaré characteristic of semi-algebraic sets deﬁned by partly quadratic systems of polynomials. Journal of the European Mathematical Society, 2010, 12, 529-553.	1.4	10
12	Computing the Betti numbers of semi-algebraic sets defined by partly quadratic systems of polynomials. Journal of Algebra, 2009, 321, 2206-2229.	0.7	8
13	Single exponential path finding in semialgebraic sets Part I: The case of a regular bounded hypersurface. Lecture Notes in Computer Science, 1991, , 180-196.	1.3	8
14	Sylvester double sums and subresultants. Journal of Symbolic Computation, 2011, 46, 385-395.	0.8	7
15	Bounds for Polynomials on Algebraic Numbers and Application to Curve Topology. Discrete and Computational Geometry, 2022, 67, 631-697.	0.6	7
16	Computing the dimension of a semi-algebraic set. Journal of Mathematical Sciences, 2006, 134, 2346-2353.	0.4	6
17	An asymptotically tight bound on the number of semi-algebraically connected components of realizable sign conditions. Combinatorica, 2009, 29, 523-546.	1.2	3
18	New fast euclidean algorithms. Journal of Symbolic Computation, 2013, 50, 208-226.	0.8	2

#	Article	IF	Citations
19	Quantitative results on quadratic semi-algebraic sets. Electronic Notes in Discrete Mathematics, 2008, 31, 129.	0.4	0
20	An international and interdisciplinary project to analyze and help reduce the gender gap in mathematics and the natural sciences. AIP Conference Proceedings, 2019, , .	0.4	0
21	Sylvester double sums, subresultants and symmetric multivariate Hermite interpolation. Journal of Symbolic Computation, 2020, 96, 85-107.	0.8	0
22	Quantitative curve selection lemma. Mathematische Zeitschrift, 0, , 1.	0.9	0