Christopher A. Francisco Curriculum Vitae

Department of Mathematics		Home Phone: (607) 253-5476
Cornell University Ithaca, NY 14853	, Malott Hall	E-mail: chris@math.cornell.edu http://www.math.cornell.edu/~chris
Education:	Ph.D., Mathematics , Cornell University, expected May 2004 <i>Ph.D. Thesis: Hilbert functions and graded free resolutions</i> <i>Advisor: Michael Stillman</i>	
	M.S., Mathematics, Cornell University,	January 2002
	B.S., Mathematics , University of Illinois May 1999	s at Urbana-Champaign (UIUC),
	B.A., Economics , University of Illinois a Graduated Summa Cum Laude with Hig	tt Urbana-Champaign, May 1999 ghest Distinction in Mathematics
Citizenship :	United States	
Research Interests :	Commutative algebra, computational algemethods	ebra, and homological and combinatorial
Publications :	C. A. Francisco, Almost complete interse to appear, <i>Journal of Algebra</i> , 2004.	ections and the Lex-Plus-Powers Conjecture,
	C. A. Francisco, Minimal graded Betti nu Algebra 31 (2003), 4971-4987.	umbers and stable ideals, Communications in
Selected Fellowships & Scholarships :	NSF Graduate Research Fellow, 1999-2002 Cornell Graduate School Olin Fellow, 2003-2004 Barry M. Goldwater Scholar, 1998-1999 LAS Dorothy Nowlin Endowment Scholarship, UIUC, 1998-1999 Campus Honors Program Merit Scholarships, UIUC, 1995-1997 Amoco National Merit Scholarship, 1995-1996	
Selected Academic Awards :	 Eleanor Norton York Award for "excel mathematics graduate student, 2001 Phi Beta Kappa member, 1999- Greenwood-Trjitzinsky Prize; received research papers at UIUC, 1998-1999 H. Roy Brahana Prize for outstanding m 	llent academic performance" as a Cornell twice for best undergraduate mathematics nathematics student with senior standing at
	UIUC, 1998 Calvin Ke Student Leadership Award the UIUC Campus Honors Program, 199 Salma Wanna Prize for the outstanding 1997	for outstanding achievement and service in 98 continuing mathematics student at UIUC,

Teaching Awards:	 Finalist, Clark Award for Distinguished Teaching for Cornell University College of Arts and Sciences, 2003 Graduate Student Teaching Award for Cornell mathematics department's most outstanding graduate student teacher, 2002 "Incomplete List of Teachers Ranked as Excellent by Their Students" at UIUC; appeared twice with instructor ratings "outstanding" (top 10% of all TA's), 1998-1999 	
Conference Talks :	 "The Lex-Plus -Powers Conjecture," an invited talk at the AMS Spring Eastern Section Meeting in Montreal, May 2002 "Some computational work on the Multiplicity Conjecture," at the Route 81 Conference on Commutative Algebra and Algebraic Geometry, Oct. 2003 "Almost complete intersections and the Lex-Plus -Powers Conjecture," at the Route 81 Conference on Commutative Algebra and Algebraic Geometry, Oct. 2002 	
Conference Organized:	Co-organizer (with I. Peeva), Special Session on Syzygies and Hilbert Functions at AMS Southeastern Section Meeting in Tallahassee, Mar. 2004	
Seminar Talks :	 "The Multiplicity Conjecture," in Cornell Computational and Commutative Algebra Seminar, Sep. 2003 "The Lex-Plus -Powers Conjecture," in Cornell Computational and Commutative Algebra Seminar, Feb. 2003 "Hilbert functions and the Eisenbud-Green-Harris Conjecture," in Cornell Computational and Commutative Algebra Seminar, Oct. 2002 "Some conjectures on lex-plus -powers ideals," in Cornell Combinatorial and Algebraic Geometry Seminar, Jan. 2002 "Hilbert functions and graded Betti numbers," in Cornell Combinatorial and Algebraic Geometry Seminar at Cornell, Feb. 2001 "The group structure of supersingular elliptic curves," in UIUC Algebraic Theory Seminar, Feb. 1999 "A problem in computational group theory," in the Graduate Student Program on Algorithmic Algebra and Geometry at MSRI, Jul. 1998 	
Expository Talks :	 "Some commutative algebra in codimension 2," in the graduate student colloquium at Cornell, Sept. 2002 "Hilbert functions," in the graduate student colloquium at Cornell, Nov. 2000 "An introduction to game theory," invited talks at Hobart and William Smith College and Ithaca College to undergraduates and faculty, Fall 2000 (Part of the Preparing Future Faculty Program) "An introduction to Gröbner bases and their applications," in the graduate student colloquium at Cornell, March 2000 	
Conferences Attended:	 MSRI Workshop on Computational Commutative Algebra, Mar. 2003 Special Session on Commutative Algebra and Algebraic Geometry at AMS Eastern Section Meeting in Montreal, May 2002 Route 81 Conferences on Commutative Algebra and Algebraic Geometry, Oct. 1999, Oct. 2000, Nov. 2001, Oct. 2002, Oct. 2003 MSRI Graduate Student Program on Algorithmic Algebra and Geometry, Jul. 1998 	

Teaching Experience :	 Instructor for Math 111 at Cornell, a first-semester Arts and Sciences calculus course. Taught my own sections independently, 2002-2003 Recitation instructor for Math 221 at Cornell, a linear algebra course, Spring 2002 Recitation instructor for Math 106 at Cornell, calculus for biologists and social scientists, Spring 2001 Recitation instructor for Math 120 at UIUC, a first-semester Liberal Arts and Sciences calculus course, 1998-1999
Teaching Activities:	 Part of NSF-funded "Improving Calculus: Developing Concepts Through Good Questions" project; developed teaching materials for first-semester calculus classes to emphasize conceptual ideas in calculus and relate them to students' own experiences, 2002-2003 Mentor for new TAs; mentored two new first-semester calculus teaching assistants in the Cornell mathematics department, Spring 2003 Teaching Assistant Trainer for the Cornell mathematics department, Summer 2002 Lecturer, short course on undergraduate abstract algebra; helped prepare incoming Cornell math graduate students; developed an outline of topics with which the students should be familiar before taking graduate algebra, Aug. 2002
Service :	 Graduate student class representative in Cornell mathematics department, 2000-2001, 2002-2003 Undergraduate member, UIUC Campus Teaching Awards Committee, Spring 1999 Undergraduate member, UIUC math department teaching awards committees, 1998-1999 Undergraduate member, UIUC math department Undergraduate Affairs Committee, 1997-1998