# Christina (Maher) Safranski

 $E ext{-}mail$ : csafranski@franciscan.edu

cmaher@alumni.nd.edu

Office: (740) 284-5281

Department of Mathematics

Franciscan University of Steubenville

1235 University Boulevard Steubenville, OH 43952

# **EDUCATION**

# Ph.D. in Mathematics, University of Notre Dame

May 2009

Advisor: Julia Knight

M.S. in Mathematics, University of Notre Dame

May 2006

## **B.S. in Mathematics**, University of Notre Dame

May 2004

Cum laude, concentration in computer programming, Honors Program, with thesis.

## ACADEMIC EMPLOYMENT

#### Associate Professor, Franciscan University of Steubenville

Fall 2018-present

Responsible for teaching twenty-four credits per academic year while providing service to the college and community, and engaging in professional development.

#### Assistant Professor, Franciscan University of Steubenville

Fall 2015-Fall 2018

Responsible for teaching twenty-four credits per academic year while providing service to the college and community, and engaging in professional development.

#### Assistant Professor, Saint Vincent College

Fall 2009-Spring 2015

Responsible for teaching twenty-four credits per academic year while providing service to students, college and community, and engaging in professional development.

# Faculty Fellow, Colby College

Fall 2008-Spring 2009

Responsible for teaching four classes per academic year while conducting research and participating in the life of the department.

#### Graduate Teaching Assistant, University of Notre Dame

Fall 2004-Spring 2008

Graduate student, responsible for teaching or TA-ing one semester each academic year.

#### Publications

"Family as Vocation; Work as Mission", S. B. Quinn, and C. Safranski, *Journal of Humanistic Mathematics*, Volume 8 Issue 2 (July 2018), pages 106-114.

"Describing free groups", J. Carson, V.S. Harizanov, J.F. Knight, K. Lange, C. McCoy, A. Morozov, S. Quinn, C. Safranski, and J. Wallbaum, *Trans. of the Amer. Math. Soc.*, 364 (2012) 5715-5728.

"The computable embedding problem", J. Carson, E. Fokina, V.S. Harizanov, J.F. Knight, C. Safranski, S. Quinn, and J. Wallbaum, *Algebra and Logic*, 50 (2012), pp 478-493.

"Classes of Ulm type and coding rank-homogeneous trees in other structures", E. Fokina, J.F. Knight, C. Safranski, A. Melnikov, and S.M. Quinn, J. of Symbolic Logic, 76 (2011), pp 846-869.

"Automorphisms of certain groups and semigroups of matrices", M. Alwill, C-K. Li, C. Maher, and N-S. Sze, *Linear Algebra and its Applications*, 412 (2006), pp. 490-525.

Page: 1 of 3

## Talks and Presentations

A Tale of Two CAS's

MAA MathFest, August 2016.

Math Games People Play

Saint Vincent College Mathematics Club Meeting, October 2012.

Generalizing the Pull-back Theorem

Notre Dame Logic Seminar, February 2009.

Math Games People Play

Colby College Mathematics Colloquium, October 2008.

Generalizing the Pull-back Theorem

AMS Regional Meeting (Wesleyan University), October 2008 (invited).

Computable Embedding Problems

AMS Regional Meeting (Middle Tennessee State University), November 2007 (invited).

Computable Embedding Problems

Computable Models and Numberings Workshop (Novosibirsk, Russia), August 2007 (invited).

Computable Isomorphism in the Context of Borel Equivalence Relations

Graduate Student Conference in Logic (University of Wisconsin-Madison), April 2006 (invited).

 $Computable\ Isomorphism\ in\ the\ Context\ of\ Borel\ Equivalence\ Relations$ 

Notre Dame Logic Seminar, February 2006.

Multiplicative Maps on Matrix Groups and Semigroups

Nebraska Conference for Undergraduate Women in Mathematics, February 2004.

# OTHER CONFERENCES ATTENDED

Inquiry-based Learning and Teaching in Mathematics (Austin, TX), June 2018.

MAA PREP Workshop: Becoming a Successful WeBWork System Administrator (online) July 2015.

MAA PREP Workshop: Authoring Effective Homework Problems with WeBWorK (online) June 2014.

Joint Mathematics Meetings (Baltimore, MD), January 2014.

American Institute of Mathematics - Computable Stability Theory (Palo Alto, CA), August 2013.

SUMR Reunion Conference (Notre Dame, IN), March 2013.

Joint Mathematics Meetings (San Diego, CA), January 2013.

Joint Mathematics Meetings (Washington, DC), January 2009.

Graduate Student Conference in Logic (University of Notre Dame), April 2008.

Organized group meals, social events, and housing for visitors.

Joint Mathematics Meetings (San Diego, CA), January 2008.

Graduate Student Conference in Logic (University of Illinois at Chicago), April 2007.

AMS Regional Meeting (University of Notre Dame), April 2006.

Midwest Model Theory (Ohio State University), October 2005.

Proof Theory Workshop (University of Notre Dame), June 2005.

Vaught's Conjecture Workshop (University of Notre Dame), May 2005.

International Conference on Matrix Analysis and Applications (Nova Southeastern University), December 2003.

# TEACHING EXPERIENCE

## Instructor, Franciscan University of Steubenville

Fall 2015 - present

Taught a survey of mathematics course for liberal arts students satisfying their core requirement; calculus for business majors; and abstract algebra, ring theory, linear algebra, and discrete mathematics for mathematics, computer science, and pre-engineering majors.

#### Instructor, Saint Vincent College

Fall 2009 - Spring 2015

Taught first, second and third calculus courses, all for math, science or engineering majors; and first and second calculus courses for business, biology, and pharmacy majors. Also a methods of proof transition course for math majors and minors; linear algebra; and a first semester of abstract algebra.

# Instructor, Colby College

Fall 2008 - Spring 2009

Taught an intro to mathematical logic course for math majors, and a second calculus course. Also, a calculus with pre-calculus course, which started in the fall semester and continued into the January term, covering the same material as a regular first calculus course but with more background and thus requiring more time.

# Instructor, University of Notre Dame

Summer 2006 - Fall 2007

Taught an introductory calculus course for first-year business students. Also twice taught a terminal calculus course for arts and letters students, intended for an audience with math backgrounds which are insufficient for business, science, or engineering calculus, and students required permission from the dean to enroll.

#### DEPARTMENTAL SERVICE AND TEACHING HONORS

#### Faculty Advisor of the Mathematics Club

Spring 2012 - Spring 2015

Helped with the creation of a student-run Math Club at Saint Vincent College and was responsible for presenting at some meetings, reserving rooms, and general advising of the student officers.

#### Faculty Liaison for Student Activities

Fall 2008 - Spring 2009

Responsible for suggesting, organizing, and approving student activities and events, either math-related or math major supporting. Also responsible for posting problems, correcting solutions and notifying students in the Colby College instance of a national mathematics competition.

Outstanding Graduate Student Teacher Award for Excellence in Teaching Spring 2007

Received an award from the University of Notre Dame Kaneb Center for Teaching and Learning recognizing graduate students who are nominated by their department for excellence in teaching, based on faculty observations and student evaluations.

Page: 3 of 3