

CURRICULUM VITAE

Katia Vogt Geisse

CONTACT INFORMATION

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PERSONAL INFORMATION

Date of birth: July 06, 1981
Place of birth: Santiago de Chile
Citizenship: Chile

EDUCATION

2009-2014	Ph.D. in Mathematics (Mathematical Biology), Purdue University, West Lafayette, IN, USA.
2006-2008	Master courses in Exact Sciences major in Mathematics- Pontificia Universidad Católica de Chile, Santiago, Chile.
2003-2005	Licenciatura en Matemáticas- Pontificia Universidad Católica de Chile, Santiago, Chile.
2001-2003	Studium der Mathematik- Universität Augsburg, Augsburg, Germany.
2000	Licenciatura en Matemáticas- Pontificia Universidad Católica de Chile, Santiago, Chile.
1999	Colegio Alemán de Santiago, Santiago, Chile.
1996-1999	Theodor Heuss Gymnasium Nördlingen, Germany.
1993-1996	Realschule Maria Stern, Nördlingen, Germany.
1988-1993	Colegio Alemán de Santiago, Santiago, Chile.

RESEARCH EXPERIENCE/PUBLICATIONS

- Ph.D. Thesis

K. Vogt-Geisse, *Structured deterministic models applied to malaria and other endemic diseases*, to appear in Purdue University, Dissertations & Theses @ CIC Institutions; ProQuest Dissertations & Theses A& I, (2014).

■ Refereed Journal Papers

K. Vogt-Geisse, C. Ngonghala, Z. Feng, *Vaccine-age Structured Vector-host Model to Study the Effects of the Vaccine RTS,S on Malaria Prevalence*, about to be submitted.

G. Kapitanov, C. Alvey, K. Vogt-Geisse, Z. Feng, *An Age-Structured Model For the Coupled Dynamics of HIV and HSV-2*, accepted and about to be published in the Journal of Mathematical Biosciences and Engineering, 2014.

K. Vogt-Geisse, C. Lorenzo, Z. Feng, *Impact of Age-dependent Relapse and Immunity on Malaria Dynamics*, Journal of Biological Systems, Vol. 21, Issue 04, December 2013.

S. Towers, K. Vogt-Geisse, T. Chia-Chun, Q. Han, Z. Feng *The Impact of School Closures on Pandemic Influenza: Assessing Potential Repercussions Using a Seasonal SIR Model*, Journal Mathematical Biosciences and Engineering, Vol.9 Nr.2 April 2012.

S. Towers, K. Vogt-Geisse, Y. Zheng, Z. Feng, *Antiviral treatment for pandemic influenza: assessing potential repercussions using a seasonally forced SIR Model*, Journal of Theoretical Biology, Vol. 289, pp. 259-266, 2011.

■ Other Publications

N. Hernandez-Ceron, L. Mrad, M. Smit Vega Garcia, K. Vogt-Geisse, *Student Chapter Column: A New Student Chapter at Purdue*, AWM Newsletter, Volume 42, Number 5, September-October 2012.

TEACHING AND MENTORING EXPERIENCE

■ Teaching Instructor

▷ Purdue University

Spring 2011 Algebra and Trigonometry- MA153 (2 sections).

▷ Pontificia Universidad Catolica de Chile

2009 Algebra for Business (first term).

▷ Universidad Adolfo Ibáñez

2009 Calculus III, Calculus II for Business, Calculus II for Engineering, Algebra, Ordinary Differential Equations (first term).

2008 Calculus III, Algebra (second term).

■ Teaching Assistant

▷ Purdue University

Fall 2014 Advanced Mathematics For Engineers And Physicists I - MA527 (grading).

Spring'14, Fall'13 Calculus III- MA261 (3 sections).

Spring 2012 Calculus II- MA166 (3 sections).

Spring 2010 Honors Calculus III- MA174 (2 sections).

Fall 2009 Calculus III- MA261 (2 sections).

▷ Universidad Adolfo Ibáñez:

2008 Calculus II, Linear Algebra (first term).
2007 Calculus II, Linear Algebra (first and second term).

▷ Pontificia Universidad Católica de Chile:

2008 Logic (second term), Calculus I (first term).
2007 Logic (second term), Fundaments of Mathematics (first term).
2006 Logic (second term), Fundaments of Mathematics (first term), Set Theory.
2005 Introduction to Calculus, Linear Algebra and Calculus I.
2004 Calculus I.

■ Mentoring

▷ 06-07/2012 MTBI (Mathematical and Theoretical Biology Institute), eight weeks Summer Research Program. Mentor of an undergraduate research project. Arizona State University, Tempe, AZ, USA.
▷ 01/2005 PENTA UC (Programa de Estudios y Desarrollo de Talentos, Pontificia Universidad Católica de Chile).

COMPUTATIONAL SKILLS

- Wolfram Mathematica programming language (intermediate).
- Matlab programming language (intermediate).
- Latex (advanced).
- R programming language (beginner).

CONFERENCES AND SUMMER PROGRAMS ATTENDANCE/PARTICIPATION

10/2013 Fall Southeastern Sectional Meeting- October 5-6, University of Louisville, Louisville, KY.
 ▷ Invited speaker for the *Special Session on Mathematical Issues in Ecological and Epidemiological Modeling*.

8/2013 Short-term visitor at the National Institute for Mathematical and Biological Synthesis (NIMBios)- August 14-24, Knoxville TN.
 ▷ Collaboration with Dr. Calistus Ngonghala.

8/2013 Mathematical Congress of the Americas - August 5-9, Guanajuato Mexico.
 ▷ Invited speaker for the special session *Mathematical Biology*.

06/2013 The Society for Mathematical Biology Annual Meeting and Conference - June 10-13, Tempe, AZ.
 ▷ Organizer of Minisymposium: *Modeling of malaria: mathematical and biological perspectives* and 20 minutes presentation.

- 11/2012 ICERM Special Event: "Blackwell-Tapia Conference 2012 November 9-10, Providence, RI, USA.
 ▷ Poster Presentation.
- 10/2012 SACNAS National Conference: Science, Technology, and Diversity for a Healthy World - October 11-14, Seattle, WA, USA.
 ▷ Poster Presentation.
- 09/2012 Math Biology: Looking at the Future (MBI's 10th Anniversary Meeting)- September 19-21, Ohio State University, Columbus, OH, USA.
- 06/2012-07/2012 MTBI (Mathematical and Theoretical Biology Institute) eight weeks Summer Research Program, Arizona State University, Tempe, AZ, USA.
 ▷ Poster presentation and 10 min oral presentation.
- 11/2011 68th Midwest PDE Seminar- University of Notre Dame - Nov. 4-6 2011, Notre Dame, IN, USA.
- 07/2011 CBMS: Mathematical Epidemiology with Applications - July 25-29, East Tennessee State University, Johnson City, TN, USA.
 ▷ Poster presentation.
- 08/2008 Congreso Matemática Capricornio (COMCA) Iquique, Chile.
- 11/2007 Simposio de la sociedad de Matemática de Chile (SOMACHI), Punta de Tralca, Chile.
- 11/2006 Encuentro Sociedad de Matemática de Chile (SOMACHI), Olmué, Chile.
- 08/2006 Congreso Matemática Capricornio (COMCA), La Serena, Chile.
- 11/2005 Encuentro Sociedad de Matemática de Chile (SOMACHI). Olmué, Chile.
- 08/2005 Congreso Matemática Capricornio (COMCA), Antofagasta, Chile.
- 01/2005 VIII Escuela de Verano de Matemática (summer school), Pontificia Universidad Católica de Chile.
- 11/2004 Encuentro Sociedad de Matemática de Chile (SOMACHI), Olmué, Chile.

AFFILIATIONS

- 2012-present Member of SACNAS (Society for the Advancement of Chicanos and Native Americans in Science) and member of SACNAS Purdue Chapter.
- 2011-present Member of AMS (American Mathematical Society).
- 2011-present Member of AWM (Association for Women in Mathematics) and member of AWM Purdue Student Chapter.

LEADERSHIP

2013	Reviewer for the <i>Journal of Theoretical Biology</i> .
06/2013	Organizer of the Minisymposium <i>Modeling of malaria: mathematical and biological perspectives</i> at the SMB (Society for Mathematical Biology) Annual Meeting and Conference - June 10-13, Tempe, AZ.
2012-2013	Graduate Student Representative (PUMa Rep) of the Department of Mathematics Purdue University.
2011-2012	Treasurer of the Purdue Chilean Association (PCA).
2011-2012	Co-founder and treasurer of the Purdue Student Chapter of the Association for Women in Mathematics (AWM Purdue Student Chapter).
2008	Graduate Student Representative of the Department of Mathematics Pontificia Universidad Católica de Chile.

GRANTS, FELLOWSHIPS, SCHOLARSHIPS

Summer 2014	Purdue University Graduate School Summer Research Grant (GSSRG) recipient.
Summer 2013	Landahl Travel Grant recipient (to attend the SMB Annual Meeting).
2012-2013	Research Fellowship, supported by Prof. Zhilan Feng, Purdue University.
Summer 2012	Scholarship from MTBI to attend the MTBI summer program.
Fall 2012	SACNAS Scholarship recipient.

LANGUAGES

Spanish	Native speaker.
German	Native speaker.
English	Full professional proficiency.