

# Joel Galenson

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CONTACT INFORMATION	Computer Science 582 Soda Hall University of California, Berkeley Berkeley, CA 94720	650-804-6870 <a href="mailto:joel@cs.berkeley.edu">joel@cs.berkeley.edu</a> <a href="http://www.cs.berkeley.edu/~joel/">http://www.cs.berkeley.edu/~joel/</a>
RESEARCH INTERESTS	Program synthesis, static and dynamic analysis, testing, compilers, language design	
EDUCATION	<b>University of California, Berkeley</b> Ph.D. Advisors: Rastislav Bodik and Koushik Sen	2014
	<b>Stanford University</b> B.S. (honors, distinction)	2008
HONORS AND AWARDS	2 <sup>nd</sup> place, LIVE 2013 Best Student Paper Award, ADKDD 08 Winner of 3D video game competition at Stanford Tau Beta Pi (junior year)	2013 2008 2007 2007
PUBLICATIONS	Joel Galenson. Dynamic and Interactive Synthesis of Code Snippets. Ph.D. Dissertation, 2014.  Joel Galenson, Philip Reames, Rastislav Bodik, Bjoern Hartmann, and Koushik Sen. CodeHint: Dynamic and Interactive Synthesis of Code Snippets. In <i>International Conference on Software Engineering (ICSE 2014)</i> , Hyderabad, India, 2014.  Mihai Budiu, Joel Galenson, and Gordon D. Plotkin. The Compiler Forest. In <i>Proceedings of the 22nd European conference on Programming Languages and Systems (ESOP 2013)</i> , Rome, Italy, 2013.  David Gay, Joel Galenson, Mayur Naik, and Kathy Yelick. Yada: Straightforward Parallel Programming. In <i>Parallel Computing</i> , Elsevier, 2011.  Rastislav Bodik, Satish Chandra, Joel Galenson, Doug Kimmelman, Nicholas Tung, Shaon Barman, and Casey Rodarmor. Programming with Angelic Nondeterminism. In <i>Proceedings of the 37th Symposium on Principles of Programming Languages (POPL 2010)</i> , Madrid, Spain, 2010.  Jason Auerbach, Joel Galenson, and Mukund Sundararajan. An empirical analysis of return on investment maximization in sponsored search auctions. In <i>Proceedings of the Second International Workshop on Data Mining and Audience Intelligence for Advertising (ADKDD 2008)</i> , Las Vegas, Nevada, USA, 2008.	
EXPERIENCE	<b>Graduate Student Researcher</b> , University of California, Berkeley Am a member of the Parallel Computing Laboratory (Par Lab).	Fall 2008 - Summer 2014
	<b>Teaching Assistant</b> , University of California, Berkeley Was a TA for CS 61B: Data Structures.	Spring 2014
	<b>Intern</b> , Microsoft Research Silicon Valley Worked on an architecture for modular cooperating compilers.	Summer 2011

**Intern**, Microsoft Research Silicon Valley Summer 2010  
 Worked on a new architecture for evaluating LINQ queries that encompasses DryadLINQ.

**Teaching Assistant**, University of California, Berkeley Fall 2009  
 Was a TA for CS 164: Programming Languages and Compilers.

**Intern**, IBM T.J. Watson Research Center Summer 2009  
 Worked on the constraint-based type system for the X10 language.

**Platform intern**, Mozilla Summer 2008  
 Worked on a native code compiler for regular expressions.

**Section Leader for CS 106**, Stanford University Fall 2005 - Summer 2008  
 Taught a section covering introductory programming topics, graded homework and exams, staffed a help desk.

**Researcher**, Stanford University Summer 2006 - Spring 2008

- Built a verifying compiler for Zohar Manna and Aaron Bradley.
- Worked on two static analysis tools for Zohar Manna.
- Investigated the properties of online ad auctions and bidder strategies with Tim Roughgarden.
- Developed methods to enable the use of remote computers to speed up data processing by a robot for Andrew Ng.
- Developed techniques for visualizing personal information spaces for Pat Hanrahan.

**Teaching Assistant**, Stanford University Winter 2008  
 Was a TA for CS 156: Calculus of Computation.

**Resident Computer Consultant**, Stanford University Fall 2006 - Spring 2008  
 Assisted undergraduates with personal computer problems and administered a dorm network.

PROFESSIONAL ACTIVITIES	Artifact Evaluation Committee: POPL	2015
	External reviewer: PLDI, CAV	2014
	External reviewer: ASPLOS, OOPSLA, VMCAI	2013
	Graduate Admissions Committee, UC Berkeley	2009

LEADERSHIP	Computer Science Graduate Student Association member	Fall 2013 - Spring 2014
	Graduate Assembly committee representative	Fall 2013 - Spring 2014
	Organized UC Berkeley Programming Languages seminars	Fall 2009 - Summer 2014

COMPUTER SKILLS	C, C++, Java, Scala, OCaml, C#, Python, JavaScript, L <sup>A</sup> T <sub>E</sub> X, HTML
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REFERENCES	<i>Available on request</i>
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