Zhongpeng Lin

Education

Graduate Student Researcher

University of California Santa Cruz, CA, USA 2010 - now PhD, Computer Science, GPA: 3.89/4.00 • Thesis topic: Understanding and Simulating Software Evolution • Research areas: Software evolution, software repository mining o Courses: Information Retrieval, Machine Learning, Artificial Intelligence, Analysis of Algorithms, Mathematical **Statistics Institute of Software, Chinese Academy of Sciences (ISCAS)** Beijing, China MS, Computer Software and Theory, GPA: 87.9/100 2007 - 2010• Research areas: software cost estimation, software bug prediction Courses: Advanced Data Mining, Advanced Software Engineering o Honors and awards: Outstanding Student of 2009, available to top 15% graduate students **Xiamen University** Xiamen, China BS, Software Engineering, GPA: 90.0/100 2003 - 2007 Honors and Awards - Distinguished Graduate of 2007, available to top 3% graduates by GPA each year - China Construction Bank Scholarship of 2006 and 2007, available to top 5% by GPA undergraduate students each vear - Xiamen University First-Rank Scholarship of 2004 and 2005, available to top 5% by GPA undergraduate students each year Experience Academic Services..... Information and Software Technology 2014 - 2015Reviewer Reviewed manuscript No. INFSOF-D-14-00238 and INFSOF-D-14-00238R1 The 11th Working Conference on Mining Software Repositories (MSR 2014) Reviewer 2014 Reviewed Submission #10 and #19 The 35th International Conference on Software Engineering (ICSE 2013) San Francisco Student Volunteer 2013 The 9th Working Conference on Mining Software Repositories (MSR 2012) Reviewer 2012 Reviewed Submission #46 and #55 The 25th IEEE International Conference on Software Maintenance 2009 Subreviewer Reviewed Submission #157

Santa Cruz, CA, USA

2010 - 2015

Projects:

- Worked on CHEKOFV project, funded by DARPA's CSFV program, that tried to build games for cloud source based formal verification. In the first game, *Xylem*, I worked as the main backend (Node.js and Express) developer and one of key developers of the game client (ActionScript 3). In the second game, *Binary Fission*, I worked as the main backend (Python and Flask) developer.
- Worked on a NASA funded project *Understanding the Design Space of Mixed Initiative Robot Design Tools*, developed the prototype, *Botprint* in JavaScript. It used Raphael.js to sketch the robot chassis in 2D, and Three.js to render it in 3D.
- Worked on a NSF funded project on bug prediction. Extended the open source project *CVSAnalY* to identify commits that introduce buggy code chunks.

Working....

MicrosoftRedmond, WA, USASoftware Engineer2015-present

Microsoft Redmond, WA, USA

SDET Intern 2014

Google Mountain View, CA, USA

Software Engineering Intern
Developed a JavaScript fuzzer that generates random JavaScript to test Closure Compiler.

Hoolai Social Game Ltd Beijing, China

Part-time Software Engineer, Database Administrator, System Administrator

2008 - 2009

- Developed several social network games using Ruby On Rails and Adobe Flex, one of which had more than 600 thousand Daily Active Users at its peak
- Setting up and maintaining a web infrastructure comprised of an Nginx/lighttpd server as load balancer, and several Nginx/lighttpd servers with several Phusion Passenger processes on each server to process more than 10 million HTTP requests every day
- Configuration and optimization of the MySQL and Memcached servers

Xiamen Shepherd Co., Ltd

Xiamen, China

Intern 2007

Used ROR and adopted Extreme Programming practices to develop several projects, including a Agile development management system AgilePlanner and an on-line music composition website ComposeItYourself.

Teaching....

University of California

Santa Cruz, CA, USA

Teaching Assistant

2011

Courses: Machine Learning and Data Mining, Introduction to Database Management Systems, and Introduction to Computer Science

Publications

Zhongpeng Lin. *Understanding and Simulating Software Evolution*. PhD thesis, University of California, Santa Cruz, December 2015.

Zhongpeng Lin and Jim Whitehead. Why power laws? an explanation from fine-grained code changes. In *Proceedings of the 12th Working Conference on Mining Software Repositories (MSR 2015)*, pages 68–75, Florence, Italy, May 2015.

Kate Compton, Dylan Lederle-Ensign, Zhongpeng Lin, Joe Mazeika, Afshin Mobramaein, Jonathan Pagnutti, Huascar Sanchez and Jim Whitehead. Botprint: Casual robotic evolution. In *Computational Creativity and Games Workshop*, Park City, UT, USA, 2015.

Zhongpeng Lin and Jim Whitehead. Using fine-grained code change metrics to simulate software evolution. In *Proceedings of the 5th International Workshop on Emerging Trends in Software Metrics (WETSoM 2014)*, pages 15–18, Hyderabad, India, June 2014. ACM Press.

Heather Logas, Jim Whitehead, Michael Mateas, Richard Vallejos, Lauren Scott, Dan Shapiro, John Murray, Kate Compton, Joseph Osborn, Orlando Salvatore, Zhongpeng Lin, Huascar Sanchez, Michael Shavlovsky, Daniel Cetina, Shayne Clementi and Chris Lewis. Software verification games: Designing Xylem, the code of plants. In *Proceedings of the 9th International Conference on the Foundations of Digital Games (FDG 2014)*, 2014.

Zhongpeng Lin, Chris Lewis, Sri Kurniawan, and Jim Whitehead. Why players start and stop playing a Chinese social network game. *Journal of Gaming & Virtual Worlds*, 5(3):307–328, 2013.

Zhongpeng Lin. Understanding and simulating software evolution. In *Proceedings of the 35th International Conference on Software Engineering (ICSE 2013)*, pages 1411–1414, San Francisco, CA, USA, May 2013. IEEE/ACM.

Chris Lewis, Zhongpeng Lin, Caitlin Sadowski, Xiaoyan Zhu, Rong Ou, and E. James Whitehead Jr. Does bug prediction support human developers? findings from a google case study. In *Proceedings of the 35th International Conference on Software Engineering (ICSE 2013)*, pages 372–381, San Francisco, CA, USA, May 2013. IEEE/ACM.

Caitlin Sadowski, Chris Lewis, Zhongpeng Lin, Xiaoyan Zhu, and E. James Whitehead. An empirical analysis of the fixcache algorithm. In *Proceeding of the 8th Working Conference on Mining Software Repositories (MSR 2011)*, pages 219–222, Honolulu, HI, USA, May 2011. ACM Press.

Jing Du, Ye Yang, Zhongpeng Lin, Qing Wang, Mingshu Li, and Feng Yuan. A case study on usage of a software process management tool in china. In *Proceedings of the 2010 Asia Pacific Software Engineering Conference*, pages 443–452, Sydney, Australia, November 2010. IEEE Computer Society.

Zhongpeng Lin, Fengdi Shu, Ye Yang, Chenyong Hu, and Qing Wang. An empirical study on bug assignment automation using chinese bug data. In *Proceedings of the 3rd International Symposium on Empirical Software Engineering and Measurement*, pages 451–455, Lake Buena Vista, FL, USA, October 2009. IEEE.