*Laura Devendorf*

ldevendorf@ischool.berkeley.edu
portfolio at artfordorks.com

**EDUCATION**

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|---|---|
| 2011-present | University of California, Berkeley<br>PhD, School of Information with designated emphasis in New Media<br>advisor: Kimiko Ryokai<br>courses: social aspects of information; geometry processing and mesh generation; computer aided geometric design; gender, math, and science; qualitative research methods. |
| 2009 - 2011 | University of California, Santa Barbara<br>BS, Computer Science, Honors<br>courses: data visualization, cryptography, programming languages. |
| 2002 - 2006 | University of California, Santa Barbara<br>BA, Studio Art, Honors<br>courses: visual literacy, advanced drawing, and print making. |

**REFEREED PUBLICATIONS**

**Laura Devendorf,** Abigail De Kosnik, Kate Mattingly, Kimiko Ryokai. "Probing the Potential of Post-Anthropocentric 3D Printing." *In Proceedings of the SIGCHI Conference on Designing Interactive Systems* (DIS '16 )
**Best Paper Award**

Noura Howell, **Laura Devendorf,** Rundong Tian, Tomas Vega, Nan-Wei Gong, Ivan Poupyrev, Eric Paulos, Kimiko Ryokai. "Biosignals as Social Cues." *In Proceedings of the SIGCHI Conference on Designing Interactive Systems* (DIS '16)

**Laura Devendorf,** Joanne Lo, Noura Howell, Doris Lee, Nan-Wei Gong, Emre Karagozler, Ivan Popuyrev, Eric Paulos, Kimiko Ryokai. "'I don't want to wear a screen': Probing perceptions of and possibilities for dynamic displays on clothing. *In Proceedings of the SIGCHI Conference on Human Factors in Computing Systems* (CHI '16)
**Best Paper Award**

**Laura Devendorf** and Kimiko Ryokai. "Being the Machine: Reconfiguring Agency and Control in Hybrid Fabrication." *In Proceedings of the SIGCHI Conference on Human Factors in Computing Systems* (CHI '15)
**Best Paper Honorable Mention**

**Laura Devendorf** and Daniela Rosner. "Reimagining Digital Fabrication as Performance Art." *In Extended Abstracts of the SIGCHI Conference on Human Factors in Computing Systems* (alt.chi '15)

**Laura Devendorf** and Kimiko Ryokai. "Redeform: Participatory 3D Printing in Public Places." In *Proceedings of the 2015 companion publication on Tangible and Embodied Interaction.* (TEI '15).

**Laura Devendorf** and Kimiko Ryokai. "Being the machine: exploring new modes of making." In *Proceedings of the 2014 companion publication on Designing interactive systems*. (DIS Companion '14).

**Laura Devendorf**. "Making art and making artists." In *Proceedings of the 2014 companion publication on Designing interactive systems* (DIS Companion '14).

**REFEREED PUBLICATIONS CONTINUED**

**Laura Devendorf** and Kimiko Ryokai. "AnyType: Provoking Reflection and Exploration with Aesthetic Interaction." In *Proceedings of the SIGCHI Conference on Human Factors in Computing Systems* (CHI '13).
**Best Paper Honorable Mention**

**Laura Devendorf** and Kimiko Ryokai. "AnyType: creating typography from anything, anywhere." In *Proceedings of the 2012 ACM Conference on Ubiquitous Computing* (UbiComp '12).

**OTHER PUBLICATIONS**

**Laura Devendorf**. "Anatomy of a Cyborg 3D Printer." Invited project for 3D Additivist Cookbook. Curated by Morehshin Allahyari and Daniel Rourke. Forthcoming 2016.

**WORK EXPERIENCE**

2012 – 2015 **Graduate Student Researcher, UC Berkeley, CA**
Prof. Kimiko Ryokai, Spring 2015 - Fall 2015
In collaboration with Google ATAP Project Jacquard, I led the design and evaluation of dynamic textile displays.

Prof. Greg Neimeyer & Prof. Ron Rael, Summer 2014
Developed syllabus and materials for a course on urban prototyping entitled "Sensing Cityscapes."

Prof. Kimiko Ryokai, Summer 2014
Developed and studied Being the Machine, a system for 3D printing by hand.

Prof. Kimiko Ryokai, Summer 2013
Developed and studied mobile typography application.

2014 - 2015 **Artist in Residence, Autodesk, San Francisco, CA**
Developed novel projects that make use of Autodesk's Pier 9 fabrication workshops and shared work as instructables.com projects.

2012 **Intern, Otherlab, San Francisco, CA**
Developed novel computer aided design and construction activities. I led the design and development of Tangles, a meshing algorithm and UI for building any object from a small set of shapes.

2009 - 2011 **Program and Events Coordinator, Interdisciplinary Humanities Center, University of California Santa Barbara, CA**
I coordinated speakers and events according to the IHC's yearly themes. I also co-founded the Platform art space at the center to showcase international artists at the campus.

2009 - 2011 **Freelance Designer and Developer, Santa Barbara, CA**
Designed and developed interactive web-based applications for clients like George Legrady, UC Institute for Research in the Arts, and artist Joan Tanner.

2010 - 2011 **Undergraduate Research Assistant, Santa Barbara, CA**

Prof. Tobias Hollerer (Computer Science), 2011.
Designed and developed novel visualization tools for topic models on text corpora and situational awareness in cyber security contexts.

Prof. John Gilbert (Computer Science), 2010.
Designed and developed an interactive application to illustrate singular value decomposition for undergraduate scientific computing courses.

2005 - 2009 **Graphic Designer and Lead Developer, Stewart+Brown, Ventura, CA**

Stewart+Brown is an independent clothing label specializing in organic and sustainable fashion products. I designed and developed the online store, developed custom web-based software to streamline production tracking, designed t-shirt graphics and promotional materials, wrote product copy, and aided in cutting and sewing garment samples.

## TEACHING EXPERIENCE

2013-2014 **Graduate Student Instructor**

*Sensing Cityscapes*
Prof. Greg Niemeyer (Art) & Prof. Ron Rael (Architecture)
Fall 2014, Developed course content, led introductory lessons on physical prototyping, and aided in the design and development of sensors deployed in urban environments.

*Theory and Practice of Tangible User Interfaces*
Prof. Kimiko Ryokai (School of Information, Center for New Media)
Spring 2013, Fall 2013, Fall 2014, Updated course content, assisted students in lab work, graded assignments, co-led critiques, developed introductory programming workshops and lessons on fabrication tools and techniques.

*Technologies for Creativity and Learning*
Prof. Kimiko Ryokai (School of Information, Center for New Media)
Spring 2014, Updated reading list, aided in the development of student-led reading discussions and class activities and graded assignments.

2013-2014 **Invited Lecturer**

*Social Research Methods in Design*
Spring 2013, Social and Organizational Issues of Information
Prof. Paul Duguid, School of Information
Organized in class activities to introduce qualitative evaluations methods and demonstrate their applicability to design applications.

*Quick and Dirty Visualization Techniques*
Spring 2013, Heath Policy and Management Studies Department Seminar
Introduced high-level design principles for information visualization and lead group through introductory visualization activities based on student data sets.

**INVITED TALKS**

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| 2016 | *Usable/Unstable: Making Space for Resistance in Design*. CU Boulder ATLAS Institute. Boulder, CO. |
| 2015 | Crafted Conversations hosted by the American Crafts Council, Museum of Craft and Design, San Francisco, CA.<br>A moderated conversation between myself and Tung Chiang, SF studio director at Heath Ceramics, on the topic of technology and craft. |
| 2015 | *Slow and Unpredictable Prototyping*, Data Clay Symposium, California College of the Arts, San Francisco CA. |
| 2014 | *Being the Machine: My Journey to Become a Human 3D Printer*, Autodesk's Pier 9 Workshop, San Francisco, CA |
| 2014 | *The Algorithm Multiple, the Algorithm Material*, Contours of Algorithmic Life Symposium. UC Davis (with Elizabeth Goodman) |
| 2013 | *AnyType: Social Meaning in DIY Typefaces*, Digital Society in Context New Media Working Group, Berkeley, CA. |

**CONFERENCE DEMONSTRATIONS**

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| 2014 | Being the Machine, Autodesk University, Las Vegas NV |
| 2012-2013 | Tangles, FabLearn, Stanford University, CA. (2013 by invitation) |
| 2012 | AnyType, Ubicomp, Pittsburgh PA |

**ART EXHIBITIONS**

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| 2015 | *3D Printing En Plein Air*. Autodesk Artist in Residence Show, San Francisco, CA |
| 2015 | *Being the Machine*. Autodesk Artist in Residence Show, San Francisco, CA |
| 2015 | *Redeform*, TEI Arts Track, Stanford University, CA (Juried) |
| 2013 | *AnyType*, Place by Design, SXSW Eco, Austin TX (Juried) |
| 2013 | *AnyType*, Urban Prototyping Festival, San Francisco, CA (Juried) |
| 2010 | *Net in Ruins*, Super Santa Barbara 2: Net Neutrality. Santa Barbara Contemporary Arts Forum, Santa Barbara, CA. Curated by Warren Schulties |
| 2008 | *Canned Laughter*, Fine Art Adoption Network, Pocket Utopia, New York, NY. Curated by Austin Thomas |
| 2008 | *Canned Laughter*, Anthology, Santa Barbara Contemporary Arts Forum, Santa Barbara, CA. (Juried) |

## SELECT PRESS

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| November 2015 | "PhD student's project 3D Print En Plein Air allows you to 3D print in nature." 3Ders.com |
| April 2015 | "Artists in Residence Give High Tech Projects a Human Touch." All Things Considered, National Public Radio. |

## PROFESSIONAL ACTIVITES

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| 2016 | **Workshop Organizer**<br>Stefanie Mueller, **Laura Devendorf**, Stelian Coros, Yoichi Ochiai, Madeline Gannon, Patrick Baudisch. "CrossFAB: Bridgeing the Gap between Personal Fabrication Research in HCI, Computer Graphics, Robotics, Art, Architecture, and Materials Science." ACM SIGCHI Conference on Human Factors in Computing Systems (CHI 2016) |
| 2015 | **Program Committee Member**<br>Graduate Student Consortium, ACM SIGCHI Conference on Creativity and Cognition, 2015 |
| 2013 | **Workshop Participant**<br>"Tangles and AnyType:" at David Mellis, Sean Follmer, Björn Hartmann, Leah Buechley, and Mark D. Gross. 2013. FAB at CHI: digital fabrication tools, design, and community. In *CHI '13 Extended Abstracts on Human Factors in Computing Systems* (CHI EA '13) |
| 2012 - 2015 | **Journal Reviewer**<br>Digital Creativity, Interacting with Computers |
| 2012 - 2016 | **Conference Reviewer**<br>ACM SIGCHI Conference on Human Factors in Computing Systems, 2012-2016<br>ACM SIGCHI Conference on Tangible and Embodied Interaction, 2014 - 2015<br>ACM SIGCHI Conference on Computer Supported & Cooperative Work, 2014<br>ACM SIGCHI Conference on Designing Interactive Systems, 2014-2016 |

## HONORS AND AWARDS

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| 2016 | **Best Paper Award**<br>CHI '16: 'I don't want to wear a screen': Probing Perceptions of and Possibilities for Dynamic Displays on Clothing<br><br>DIS '16: Probing the Potential of Post-Anthropocentric 3D Printing |
| 2013 - 2015 | **Best Paper Honorable Mention**<br>CHI '15: Being the Machine: Reconfiguring Agency and Control in Hybrid Fabrication<br><br>CHI '13: AnyType: Provoking Reflection and Exploraiton with Aesthetic Interaction |
| 2011 | **UC Berkeley Graduate Division William V. Power Award Winner** |
| 2011 | **Deans Fellowship,** to study Media Arts and Technology at UC Santa Barbara (Declined) |
| 2010- 2011 | **Scholarships**, IEEE National Engineers Week Scholarship, Yardi Systems |

Scholarship

2010-2011 **Honors Program Member**, UC Santa Barbara College of Engineering

**TECHNICAL PROFICIENCIES**

Multiple years of experience designing interactive digital and physical prototypes. Proficient with C++, Java, Javascript, Python, PHP, and MySQL for mobile and desktop applications. Proficient with mobile development using Android SDK. Extensive knowledge of Processing, OpenGL, OpenFrameworks, and Arduino platforms.