

# Y. DOROTHY JUNG

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## EDUCATION

### University of California, Berkeley

B.A. Computer Science, B.A. French with Honors

May 2015

GPA: 3.6/4.0

*Relevant Coursework*    Computer Graphics, Operating Systems and Systems Programming, Computer Architecture, Computer Security, Computer Networking, Microelectronic Circuits  
Randomized Algorithms, Efficient Algorithms and Intractable Problems, Discrete Math and Probability Theory, Linear Algebra, Differential Equations

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## EXPERIENCE

### DreamWorks Animation | R&D Intern

Redwood City, CA

- Integrated GCC 4.8 and ICC 14.1 compilers into the studio development environment by adding support to existing proprietary rendering software for C++11 features. (C++)
- Wrote a command-line tool to check for inconsistencies in metadata across ~250 packages of studio software, plug-ins, and third-party extensions for Maya, Houdini, and Nuke. (Python)
- Communicated with Technical Directors and other developers to provide technical support on *How to Train Your Dragon 2*, *Penguins of Madagascar*, and *Home*.

Jan 2014 – Jun 2014

### Mirixa Corporation | Engineering Intern

Emeryville, CA

- Generated user stories and test cases to assess functionality of the flagship product. (JavaScript)
- Worked part-time on the front-end team in an agile-waterfall hybrid environment to improve a web-based clinical platform used by commercial pharmacies and pharmaceutical schools.

Sept 2013 – Nov 2013

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## PROJECTS

### Mineti.co (Node.js/Express, Postgres, d3.js, Bootstrap)

Created an analytics tool to measure a consumer's emotional response based on EEG data. Features included a real-time dashboard, demographic search filters, and intuitive data visualizations. Made use of Emotiv SDK. Finalist for the *Novak Druce Innovation Award*. Placed 3<sup>rd</sup> out of 70+ teams at the European Innovation Academy in the final VC pitch competition.

### Brainability (Illustrator, Photoshop, Java)

Designed an Android application to measure user productivity on a task using data obtained from a portable EEG using Emotiv Insight SDK. Won the *Judges' Choice Award* at a design competition hosted by Emotiv/Pivotal Labs.

### 3D surface mesh generation (C++, OpenGL)

Subdivided parametric surfaces by interpolating control points defining a set of Bezier curves. Wrote one version for adaptive triangulation and another for uniform subdivision using de Casteljau's algorithm.

### Ray tracer (C++)

Wrote from scratch a ray tracer that rendered scenes with shadows and reflections from arbitrary .obj files. Implemented linear transformations including scales and rotations through matrix operations, and outputted images to .png files using lodePNG.

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## SKILLS

<i>Languages and Tools</i>	Python, C++(98/11), C, Java, x86 assembly, OpenGL, Bash shell scripting, gcc, gdb, make, git
<i>Web Development</i>	HTML5, CSS3, JavaScript, Node.js/Express, Angular, Ruby on Rails
<i>Human Languages</i>	French (fluent), Korean (working proficiency)

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## LEADERSHIP AND ACTIVITIES

### UC Berkeley IEEE Student Branch (Institute of Electrical and Electronics Engineers) | Officer

2013 – 2015

Organize the bi-annual UC Berkeley Startup Fair. Create flyers and pamphlets in Illustrator.

### UC Berkeley French Department | French 3-4 Tutor

2012 – 2015

### Google Women Techmakers Summit in Mountain View, CA | Conference Participant

2014