Bradley Bossard

Polyglot software engineer with over 15 years of experience

bradleybossard@gmail.com

Experience

Senior Software Engineer - moovel - *2017 - Present*

moovel develops white label mobile ticketing solutions for transit agencies.

- Microservice development and architecture
- Docker, Kubernetes and AWS
- NodeJS and Go

Senior Software Engineer - VenueNext - *2016*

VenueNext is a venture-funded startup building a platform for mobile and integrating all the services of a venue (ticketing, food & beverage ordering, loyalty, etc) in a single user experience. As a senior engineer on this remote team, my duties include

- Mobile development on both iOS and Android, backend API design.

Lead Frontend Developer - Aniden Interactive - *2012-2016*

Aniden is an interactive agency, where I was the lead developer on several frontend web projects utilizing Javascript, and Javascript frameworks and libraries.

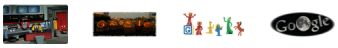
- **Yahoo Doodle** - Image spriting / loading / anmiation. Python was used for image pre-processing, pure Javascript for loading and animating the sprite.
- **Race For The Stars** - Virtual reality game and web-based scoreboard. Technologies used included Unity / Javascript / Angular / Mongo / Express / Node JS.
- **Finish Drawing** - Web app for drawing and navigating drawing gallery. Developed for **Wacom Inkation** hackathon and placed 3rd. Built using Javascript / Angular/ Mongo / Node JS and Wacom WILL library.
- **History Of Baker Hughes** - Interactive tabletop timeline. Built using Javascript / jQuery / HTML5 canvas as a Chrome App.

Software Engineer - Google - *2007-2012*

While at Google, I have namely worked in digital mapping technologies, and have been involved in…

- Google Earth 3D Buildings - Automated creation of 3D buildings using LIDAR and aerial imagery. Written in C++.
- **Google Builing Maker** - Image processing pipeline and server for serving aerial imagery. Written in C++.
- *Wapner* - Django-based internal tool for scoring 3D content. **Patent** issued for work on this project. Implemented with Django and Javascript.
- **Google Street View** - Javascript / Flash code for Google Street View and Google Maps. Particular tasks included refactoring embed codebase, and rendering code for 3D overlays in driving directions.
- **Specialty Pegmen** - 20% Project. Created 3D modeling and sprite generation pipeline for authoring over 20 Street View “specialty Pegman”. Technologies involved Python / ImageMagick for image processing and C++ / Javascript additions to Google Maps code base for defining launch regions.

- **Google Doodle Gallery** - Built interactive gallery for viewing Google Doodles.
- **Google Doodles** - First Google employee to hold title “Doodle Engineer”. Authored and launched Google Doodles using raw Javascript / HTML / CSS for optimal code. Particular Google Doodles I authored include the following links below



Experience cont.

Systems Engineer - Urban Scan - *2005 - 2007*

Urban Scan was a start-up focused on automated 3D model generation for urban environments. Acquired by Google and scaled for Google Earth

- Wrote C++ real-time acquisition sensor platform composed of cameras, GPS, and laser scanners.
- Design and manufactured custom data collection hardware
- Rresearch and purchasing of all hardware used by the company.
- Point of contact for DARPA project integrators

Consulting

CTO - DentalEMR - *2015*

Cloud-based electronic medical records webapp

- Architected and developed Django/Angular application hosted on AWS
- Interviewed and hired additional team members.
- Agile project management and sprint planning, acting SCRUMM master

Education

MSECE, Electrical and Computer Engineering - **University of Iowa** - *2001-2003*

BSEE, Electrical Engineering - **University of Iowa** - *1998-2001*

Patents and Publications

Evaluating Three-Dimensional Geographical Environments Using A Divided Bounding Area

Generation of Real-Time Synthetic Environment Using a Mobile Sensor Platform