# WILLIAM GUSS

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#### **EDUCATION**

## University of California, Berkeley

August 2015-2019

Expected B.S. in Electrical Engineering & Computer Science

Expected B.A. in Pure Mathematics

Regents' and Chancellor's Scholar (Highest honor awarded to incoming undergraduates)

Current Coursework: Data Structures (*CS 61B*), Honors Linear Algebra (*MATH H110*), Honors Real Analysis (*MATH H104*), Linear Algebra & Differential Equations (*MATH 54*).

University of Utah

August 2013 - May 2015

Nonmatriculate in Pure Mathematics & Computer Science

CS2420: Algorithms and Data Structures (A-)

Overall GPA: 3.933 (18 units)

West High School

August 2011 - June 2015

Founder/President of Computer Science Club State Sterling Scholar of Computer Science

Lead Developer/Machine Learning Researcher

Overall GPA: 4.22

### **EXPERIENCE**

### Databa.it Research

October 2013 - Present

Salt Lake City, Utah

- · Theorized and implemented new ML algorithm, Functional Neural Networks. Presented work at the Intel International Science Fair. Submitting paper to NIPS.
- · Developed DeepLearn.NET, an open source C# deep learning framework.
- · Created novel gradient descent method for feed forward ANNs and applied the algorithm to breast cancer diagnostics (mammography and FNA) with 99.8% error rate. Presented at the University of Utah Global Health Conference. Won United States Congressional App Challenge.

## West Connect (wconnect.org)

October 2014- December 2015

Full Stack Web Developer

Salt Lake City, Utah

- · Developed backend (Node.js) integration with Facebook OAuth/Google Maps API.
- · Designed UI with conjunction with Ember.js/Bootstrap/Handlebars/JQuery

## University of Utah Musculoskeletal Research Lab

Summer 2014

Intern/Developer

Salt Lake City, Utah

· Parallelized C++ finite element solver using OpenMP and Blelloch Scans.

Lost Code Studios

August 2012 - June 2014

Salt Lake City, Utah

 $Lead\ Developer$ 

- · Published "Space Hordes" to Xbox Live Indie Marketplace
- · Created component oriented entity framework for game development in C# and Java.
- · First prize in IGDA Salt Lake City Global Game Jam (2013,2014).

## TECHNICAL STRENGTHS

Computer Languages C#, .NET, C++, Java, JavaScript, PHP, Python, LaTex Protocols & APIs XML, JSON, Node.JS, Windows Phone Development, XNA

Databases MySQL, MongoDB

Tools SVN, Git, Visual Studio, Eclipse, IDLE, Heroku

Github Score 370