SKILLS

DOMINIC ZIRBEL

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Full-Stack Web HTML (Jade), CSS (Compass, LESS), jQuery Development node.js, PHP (Yii/Yii2, Zend)

SQL (MySQL), NoSQL (MongoDB)

Interest and real-world experience in Interface Design

General Programming C/C++, Python, Java - solid foundation in the feel, style, and uses of these and similar languages Linux - day-to-day use and comfort with top-level components (command line, scripting)

Git - extensive use for many years

Native Android Development - practical experience

Mathematics

Strong core, particularly in Graph Theory, Combinatorics, Linear Algebra, and Analysis Analytical thinking and problem solving

■ Putnam Exam Scores: 2013 - 10 (~65th percentile), 2015 - TBA

EXPERIENCE

■ MetabolismFun Full-Stack Web Engineering

July 2013 - Jan 2015

An online, turn-based educational game forcing the player to learn metabolic pathways in an engaging, interactive way to maximize their score. Features customizable settings, saved games, and a flat, smooth appearance.

Worked with Dr. Neocles Leontis at BGSU to develop the website to teach cellular metabolism in his classes and beyond. I was responsible for programming, design, and deployment.

Agile Oasis **Technologies**

Intern; Web Development

Summer 2013, 2015

Summer 2015: Developed social network site Project Qi. In addition to standard features (profile, friends, groups, pictures, status feed, etc.) the site aimed to connect users to non-profit organizations depending on the activity of their followers. I did backend programming in Yii2, frontend with Compass, Bootstrap, and jQuery, and worked closely with the client to create the experience he had in mind.

Summer 2013: Worked on a variety of projects, generally designing and building the frontend for contracted websites.

Personal Robotics

Intern; Android Development Summer 2012 Designed an Android application for in-house use on a humanoid robot that simplified normally difficult tasks such as adjusting motor position, displaying sensor output, or sending a direct command.

■ Game of Life

A simulation of Conway's Game of Life, developed in Java.

Independent Project 2009 - 2013

A tool as much as a game, the program allows users to work on an infinite grid, place predifined patterns, and watch cells evolve, with a powerful engine for fast simulation.

EDUCATION

■ Carnegie Mellon University Sophomore in the Mellon College of Science, majoring in Mathematics with a minor or double major in Computer Science

Math Undergraduate 2013 - Current

Cumulative GPA (as of Jan. 2016): 3.0

Bowling Green State University

Math and Computer Science classes taken during high school, including senior-level Probability/Statistics and master's level Analysis

Supplementary Classes 2009 - 2013 Cumulative GPA: 4.0

■ Saint John's Jesuit High School Graduated in 2013 as Valedictorian

2009 - 2013

Cumulative GPA: 4.8 on a 4-point scale