# Marcus Todd

http://malexandert.com me@malexandert.com | 845.820.8800

## **EDUCATION**

#### CARNEGIE MELLON UNIV.

**B.S. IN COMPUTER SCIENCE** 

Expected May 2017 | Pittsburgh, PA Minor in Photography

## LINKS

Github:// malexandert
LinkedIn:// Marcus Todd

## **COURSEWORK**

#### **UNDERGRADUATE**

Constructive Logic
Web Application Development
Principles of Software Construction
Principles of Functional Programming
Great Theoretical Ideas of CS
Mathematical Foundations of CS

## SKILLS

### **LANGUAGES**

Proficient:

Python • Scala • Java • Standard ML Familiar:

C • JavaScript • Haskell

#### **TECHNOLOGIES**

Proficient:

Git • Django • Heroku

Familiar:

Play • Akka

## **EXPERIENCE**

## **ORIGINATE** | SOFTWARE DEVELOPMENT INTERN

May - August 2015 | New York, NY

- In partnership with the company NewAer, developed features and fixed bugs for the NewAer API backend using Scala
- Implemented a garbage collection utility to allow the server to properly delete old devices on the database
- Contributed to Scalypher, a Scala-based DSL for writing Neo4j Cypher queries, to allow it to support queries for nodes in the database with no relationships

#### **GOOGLE** | SOFTWARE ENGINEERING INTERN

May - August 2014 | Mountain View, CA

- Optimized the test generation and test result collection procedure for the Google Fiber TV UI by helping develop a model-based testing framework
- Implemented the utility to run the randomly generated tests and collect and export their results using Python

## **PROJECTS**

#### **BLOBS.VR** | INTERN HACK PROJECT AT ORIGINATE

August 2015

In a team with three other interns, developed a 3D, first-person, virtual reality version of the web game Agar.io for Google Cardboard, using the Unity3D game engine and the language C# for scripting.

## A WEB GUIDE TO GETTING LOST | 15-437/15-637 FINAL PROJECT May 2015

Created a website idealistically based on Rebecca Solnit's book A Field Guide to Getting Lost that allowed users to randomly generate a path in an area of their choosing. Users would then follow the path in real life while logging their thoughts on the on-site journal. The backend was developed using Python and the Django Framework. The frontend was developed using Bootstrap and the Google Maps Javascript API.

## **EXTRACURRICULARS**

#### **WRCT: A RADIO STATION**

Student-run radio station at Carnegie Mellon

Fall 2015 - Fall 2016 Program Director

Fall 2014 - Fall 2015 Assistant External Music Director

Spring 2014 - present Air-cleared DJ

#### **DELTA UPSILON CARNEGIE CHAPTER**

Non-secret social fraternity on campus

Fall 2015 - Spring 2016 Vice President of External Relations

Fall 2014 - present Service Chair

Spring 2014 - Fall 2014 Executive Vice President