# Robert Kernan

rkernan@gmail.com https://github.com/kernan 16 Arbor Way Drive Decatur, GA 30030 770-355-4050

#### **EDUCATION**

# Georgia Institute of Technology, Atlanta, GA

August 2013

Bachelor of Science in Computer Science

Focus in Information Internetworks and Platforms

## TECHNICAL SKILLS

#### Languages

 $\bullet$  C  $\bullet$  C++  $\bullet$  C#  $\bullet$  Java  $\bullet$  Lua  $\bullet$  PHP  $\bullet$  Python  $\bullet$  Ruby

#### **Operating Systems**

• Windows 7 • GNU/Linux

#### Software

• Ant • Clang • CMake • Eclipse • GNU Compiler Collection • Make • MySQL • SQLite • Visual Studio

#### **Revision Control**

• Git • Mercurial • Subversion

#### WORK EXPERIENCE

#### Noble Systems Corporation, Atlanta, GA

January 2015 – Present

Quality Assurance Engineer

#### Southern Polytechnic State University, Marietta, GA

May 2010 - July 2010

Lab/Teaching Assistant for CSE 1302: Introduction to Data Structures

- Assigned lab-work and taught supplemental material.
  - Maintained office hours in the lab for students.
  - Submitted software requests for lab equipment.

# **PROJECTS**

#### **Vector Math Library**

April 2014 – Present

https://github.com/kernan/math

Built and currently maintaining a C++11 header-only library containing generic size and type vector and matrix implementations with specializations for 2, 3, and 4-dimensions. Includes a unit test suite built using Boost.

Graphics Engine July 2013 – Present

Building a simple, cross-platform (Windows and Linux currently) graphics engine using OpenGL as the rendering backend. Current goals are implementing a more advanced input handling system and adding lighting primitives to the scene.

Geopost June 2013 – August 2013

https://github.com/spardue/geopost

Designed and developed a REST API for creating geo-tagged content using Python. Collaborated to build an HTML5 front-end that displayed geo-tagged content on a map using the Google Maps Javascript API.

# Massive Open Online Course (MOOC) Teaching Assistant Manager

January 2013 - April 2013

https://github.com/kernan/MOOC-TA-Management

Collaborated to design and build a web application for testing and managing teaching assistants for MOOCs using Ruby on Rails; utilized Twitter Bootstrap to create a reactive front-end. Included a REST API for all functionality.

# **International Community School Joomla Intranet**

March 2012 – May 2012

Collaborate to modify and complete and intranet using Joomla that enabled teachers to communicate with students about assignments and upcoming events.

## Parser Generator and Regular Expression Language Interpreter

November 2011 – December 2011

Created scanner, parser, and interpreter in Java for a regular expression language that could find, remove, and replace

text patterns in a file. The scanner and parser tables were not language specific and could be generated by feeding the program a context-free grammar.