
SKILLS

- **Languages:** Objective-C, Swift, Lua/LuaJIT, C/C++, JavaScript, Python, Go
- **Tools / Software:** nginx, OpenResty, PostgreSQL, SQLite, Redis, OpenGL, FreeBSD, Git, Vim, Xcode
- **iOS:** Core Audio, reverse engineering (IDA disassembler, cycript), runtime modification development, app development, toolchain/framework development, Objective-C runtime, Objective-C / Lua interop, Realm, SQLite, RxSwift

EXPERIENCE

- **Superhuman** San Francisco
Software Engineer May 2018 - Present
 - Email client with much of the heavy lifting done on the client-side. Many prominent users/investors who run companies you've heard of, including Steve Huffman (Reddit CEO), Michael Lopp (Slack VP of Product/Eng), Nat Friedman (Github CEO).

It's a small/midsize startup. 9 engineers. I work with a team of 4 on the iOS app, written in mostly Swift, with some JavaScript/Objective-C/C++. I also add a few patches to the Go backend here and there. Standard run-of-the-mill bug fixes, feature work, and occasional cleanup/refactoring you'd expect at a startup.
- **Indie iOS Developer / Cydia Store Vendor (jailbreak)** Feb 2014 - May 2018
Sole Proprietorship
 - Main products: EQE, EqualizerEverywhere, Cylinder. Search Google for something like "cylinder jailbreak". All were written in a combo of Objective-C and Lua / LuaJIT, which required cross-language interop and a custom build system (no Xcode!) which I had to build from scratch (see Aite below).

Also contributed the developer community such as writing documentation on iphonedevwiki.net, contributing to upstream patches to Cydia Substrate / substitute (used for injecting code into iOS apps / processes), and helping out on IRC/Discord.

If I were to estimate, in total, my products are used by about 20% of active jailbreak users. See install counts here: apt.thebigboss.org/stats.php?dev=rweichler
- **Quixey** Palo Alto, CA
Software Engineer (Intern) Jan - July 2012
 - **Quixey Challenge:** Improved the recruiting pipeline by automating much of the process with a web application, using Meteor (Javascript / Node.js / MongoDB stack).

CYDIA PRODUCTS

- **EQE / EqualizerEverywhere:** About page: <https://eqe.fm/about>. Used to be a paid product until Cydia Store shut down in December 2018.
- **Cylinder:** Source: github.com/rweichler/cylinder Review: youtube.com/watch?v=Y-Pk-XDVj-o

SIDE PROJECTS

- **Lucy:** Lua / Objective-C bridge and runtime analysis/debugging tool for iOS. <https://github.com/rweichler/lucy>
- **jjjj:** GUI package manager for iOS (based on dpkg, similar to Cydia). <https://github.com/rweichler/jjjj>
- **Aite:** Custom build system used to develop software for Cydia. <https://github.com/rweichler/aite>
- **Sunnyveil:** 3D game engine written in C and LuaJIT. Has Lua bindings to Bullet (physics engine) and OpenGL.
- **Wuigi:** Mario clone (kind of like Mario Maker), written in Java. <https://github.com/rweichler/wuigi>
- **Luna Roja:** GameBoy emulator designed specifically for Pokémon Red. <https://hax.iimarckus.org/topic/7112/>

EDUCATION

- **UC Davis:** B.S. Computer Science, Class of 2017
- **Homestead High School:** Cupertino, CA