# RAFAEL KHAN

# **SUMMARY**

Writing software is without question my greatest passion, hobby, and achievement. I'm a web developer by trade, with over 5 years of professional experience. My interests vary from **functional programming**, to making **audio software**, to toying around with **Linux** and building **electronics**.

## **SKILLS**

- Highly proficient in modern Javascript development
  - Extensive experience developing frontend applications
  - 3 years of **React** experience (redux, react-native, et al)
  - 4 years of NodeJS experience
- Python for data processing and general scripting
- Java and Clojure
- Huge UNIX fan, and regular Linux user
  - DevOps automation
  - Docker
  - Extensive AWS experience
  - Bash
- Various SQL & NoSQL databases, most notably MySQL, PostgreSQL, MongoDB,
  DynamoDB, and Redis
- IoT (internet of things) product development
- Agile process leadership
- Services built on HTTP, such as REST APIs
- **UI/UX** design

# **EXPERIENCE**

#### Ovandi, Toronto - CTO & Co-Founder

June 2017 - Present

- Technical leader of cannabis consumer electronics startup
- Built prototype hardware
- Wrote firmware with HTTP and Bluetooth interface in C++
- Designed and developed react-native application to interface with the hardware
- Developed technical strategy in a resource constrained business
- Lead junior developers to deliver features and grow their skillset
- Agile process leader
- Iterated on product with client feedback
- Lead design team in UX development efforts

#### Mark43, New York/Toronto - Software Engineer

October 2016 - June 2017

- Build new features for the Cobalt law enforcement platform in React & Redux (https://www.mark43.com/rms/)
- Ensured backwards compatibility with existing backbone/knockout code
- Moved Redux related code to isolated modules for sharing across the Mark43 suite of tools

#### Rangle.io, Toronto - Software Engineer

March 2014 - October 2016

- Engaged in a number of full-stack Javascript consulting engagements
- Developed Angular 1.x/React applications from scratch, or extended existing client codebases
- Used NodeJS + Express/KoaJS to develop a wide variety of REST APIs, backing our various frontend applications

#### **Exclaim Solutions, Toronto** - Frontend Developer

June 2013 - September 2013

- Consulted design team to optimize existing desktop designs for responsive mobile development
- Converted PSD designs to HTML/CSS/PHP for integration with internal CMS

#### Hanen Center, Toronto - Software Developer

June 2012 - September 2012

- Used **Python** to perform analysis of regional sales data from Dynamics CRM
- Created heat map visualizations of their sales using Javascript

### **PROJECTS**

Check out my github!

#### React Techno - HTML5 time-synced beat making

https://github.com/rafkhan/react-techno

- Use WebAudio to make techno beats!
- http://react-techno.s3-website.us-east-2.amazonaws.com/ (check it out)

### WebDJ - HTML5 DJing

https://github.com/rafkhan/webdi

Hack the north 2014

- WebAudio based sound manipulation tools
- HTML5 Canvas audio visualizations
- WebRTC live streaming of DJ set
- **MIDI** integration for turntable compatibility

#### The Clusternator - NodeJS DevOps Automation

https://github.com/rangle/the-clusternator

- Docker + NodeJS based tool for internal devops at rangle
- Covers a breadth of AWS features, namely
  - EC2 + ECS for running docker boxes
  - **ELB + Route53** to manage load balancing, DNS, SSL, and zero downtime updates
  - IAM / Dynamo to manage authentication

### Other Info

- Currently learning **Elixir**, huge fan of OTP already
- I have a strong preference to solve problems with functional programming
- LISP is my favourite type of language
- Actively using **Javascript** since I was 14
- I lost my TV remote while writing this, there are no buttons, so I turned it on with an **Arduino** instead