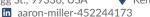
# AARON R MILLER

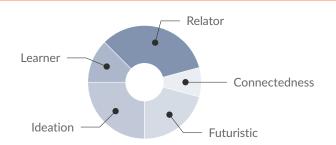
### **Fullstack Software Engineer**

- @ drkstr101@gmail.com https://watheia.com
- **J** 509-802-1855 c drkstr101
- 101 S Kellogg St., 99336, USA
  - Kennewick, WA





# CLIFTON STRENGTHS™



# **INDUSTRY EXPERIENCE**

### Watheia Labs, LLC

Self

Jun 2019 - Ongoing

Co-founder and chief technical lead at digital agency

#### **Internal Projects**

- Created a serverless double-entry bookkeeping solution with an immutable append-only transaction ledger. (Programming, Serverless, DevOps, REST, Oauth2, AWS, Lambda, QLDB, Nodejs, HTML5)
- Implemented secure backend for public contact service using a throttled API Gateway and Lambda function for real-time notification delivery (Programming, Serverless, DevOps, SendGrid, Lambda, Amazon SNS, DynamoDB, Typescript,
- Completed research, planning, and prototyping phases of a New Product Development (NPD) plan for a Platform as a Service (PaaS) product (NPD, DevOps, Serverless, Digitalocean, AWS, GCP, Kubernetes, GitLab, RancherOS, Docker, K3S, Istio, Terraform, Vault, Cloud Native Buildpacks, Python)

### Stackbit.com

- Developed and integrated a full-featured text editor for, Stackbit.com with support for basic text formatting, rich data tables. hot-links, mentions (@username), custom components support, auto-format markdown symbols, soft/hard breaks, and autoformat on paste (deserialization) for; DOCX, HTML, Markdown, and CSV content. [2] (Programming, UX, react, typescript, JavaScript, Nodejs, Slate)
- Fixed design flaws in 'stackbit-target-nextjs' [2] that prevented proper caching (change detection) and parallelization within a monorepo build. [3] (Programming, Typescript, Nodejs, Nx)

#### Auto-DevOps.com

- Created prototype PaaS serverless infrastructure on Digitalocean droplet with RancherOS running K3S preconfigured and optimized for Auto-DevOps workflows using KNative + Istio +  $GitLab\ Runner\ {\tiny (DevOps, Serverless, Digitalocean, Kubernetes, Knative, Terraform, Postgres, GitLab\ CI)}$
- Created a working prototype for multi-project build leveraging cloud-native buildpacks for Auto-DevOps. [3] (DevOps, Serverless, Kubernetes, Python, Microservices, GitLab CI)

"After many years an awesome developer has finally decided to step up and share the burden of bringing this plugin to its next stages: thanks Aaron R. Miller for your contributions, but above all, thanks for your enthusiasm and for reinvigorating the project!"

- Roberto Lo Giacco, AgileWare Co-Founder

# TOP SKILLS

Programming Leadership **Systems** Communication **DevOps** UI/UX Design Project Management S Flash Actionscript 3

# **LANGUAGES**

Typescript	• • • •
JavaScript	• • • • •
Java/JDK	• • • • •
Groovy	• • • • •
Python	• • • • •
C/C++	• • • • •
C#/.NET	• • • • •
Kotlin	• • • • •
РНР	• • • • •
Rust	• • • • •

#### **Xtext**

- Implemented AbstractCodeMiningTest and AbstractMultiQuickfixTest to provide a convenient way to test the code mining and multi-quickfix capabilities within Xtext [4] (Programming, Java, Xtext, ANTLR, LSP, Junit)
- Extended example projects and the Xtend code base to demonstrate the usage of these framework classes (Programming, Java, Xtext, ANTLR, LSP, Eclipse, Junit)

#### **Natural**

• Added LSP support to Natural; An eclipse plugin for Cucumber and JBehave [5] (Programming, Java, Xtext, ANTLR, LSP, Eclipse, Groovy, Cucumber, JBehave, BDD)

### CartoonifyIt

- Developing an Augmented Reality (AR) demo application with Rust and Android NDK [6] (Programming, Mobile, Android, C/C++, Rust)
- Ported Android NDKCamera SDK from C++ to Rust and released as a standalone crate (Programming, Mobile, Android, C/C++, Rust)

# Expedia Group

W2/Contract

iii Nov 2018 - Jun 2019

DevOps Systems Engineer at Expedia Group (WAVSYS)

### Systems Engineer II

- Reduced maintenance cost by aiding in the transition of a legacy monolith project to a more modern automation framework Programming, Backend, Stackstorm, Vault, ServiceNow, Microservices, Kubernetes, INET, Python)
- Improved the efficiency of Stackstorm pack development by building and maintaining an automated acceptance testing and specification framework (Programming, Build Systems, Stackstorm, Vault, Gradle, BDD, Java, Groovy, Python, Serenity)

# Catalyte-Surge IT Services

1099/Fulltime

Ct 2017 - Jun 2018

General contractor at staff augmentation firm

#### **Electronic Medical Records App**

 Removed primary blockers and reduced runtime memory footprint by an order of magnitude in an Electronic Medical Record (EMR) web application (Programming, FullStack, Microservices, REST, Nodejs, HTML5, ES6, Babel, Flow, Express, React, Redux)

### **Emory University 2FA**

Developed client side module and build release system for custom 2FA authentication, when using the AWS Command Line Interface within Emory University's internal network (Programming, AWS, Microservices, SOAP, Gradle, Spring, Java, Groovy, EAR)

### **Vivid Learning Systems**

W2/Fulltime

iii Oct 2012 - Apr 2017

Software developer for "eLearning" products and services company

### Sr. Programmer

- Developed prototype mobile VR app used by the sales team to entice potential customers at trade shows (Programming, Mobile Apps, C/C++, Java, Android NDK, Google VR, GearVR (Oculus), Unreal Engine)
- Automated workflow for production department and drove the adoption of Continuous Integration into the development pro-Cess Programming, Build Systems, DevOps, Systems Integration, Java, Groovy, Gradle, Python, OSGI, Jenkins, Eclipse

# **TOP ACHIEVEMENTS**



### **Advanced Placement Program**

Earned 3 college credits in Mathematics and 2 credits in Computer Science through the Advanced Placement program at Plano East Senior High



### **National Forensics League**

Won multiple trophies in varsity debate for out-of-state competitions and tournaments at Plano East Senior High



### DiggCharts

Wrote the DiggCharts application which won second place in the Digg.com Data Visualization Contest



### AllStudentRentals.com

Developed the flagship product for winner of the "Best Business Idea" contest at California State University



### **NuLabel Technologies**

Worked with Director of Science to develop database-driven software systems that replaced existing spreadsheet-based workflow in use by the lab techs; Later bundled and sold as COTS product.



### **Vivid Learning Systems**

Developed prototype mobile VR app used by the sales team to entice potential customers at trade shows



### Volunteer Work

Laid underground sprinklers and built pipe valve mechanisms at Richland Children's Center; Read blueprints and directed volunteer work crew to construct wooden playground equipment at Playground of Dreams

# REFERENCES

This document is data driven!

### Source Data & Code Samples

- github.com/drkstr101/resume
- [1] https://sb-editor.vercel.app/ (demo)
- [2] https://github.com/stackbit/sourcebit-target-next
- [3] https://gitlab.com/watheia/labs/auto-devops-example
- [4] https://www.eclipse.org/Xtext/releasenotes.html
- [5] https://github.com/watheia/Natural
- [6] https://github.com/drkstr101/Cartoonifylt
- [7] https://www.linuxquestions.org/questions/linux-software-2/gmailfs-howto-guide-to-using-your-gmail-account-as-a-linux-file-447218/

- Designed and developed front end framework to enable the production of Computer Aided Learning content as a fully Progressive Web App, eliminating the reliance on Flash/Air runtimes in flagship product (Programming, Microservices, UI/UX Design, Progressive Web App, Javascript, HTML5, Closure Compiler, Underscore, JQuery Mobile, CreateJs, Nodejs)
- Created prototype data service-oriented back-end architecture
  that supports user authentication and tracking for deployment
  scenarios outside a traditional LMS web portal, later adopted
  by another team as the basis for a rewrite to the backend LMS
  product (Programming, Microservices, RPC, C#/,NET, Entity Framework)

### Programmer II

- Implemented mobile-compatible front-end architecture to bring a flagship product to the App/Play Store (Programming, Mobile Apps, UI/UX Design, Flash/Flex, Adobe Air, Python, Apache Ant)
- Maintained existing flagship product that delivers and tracks the usage of rich media content for the purpose of Computer Aided Learning ("eLearning") (Programming, Flash/Flex, Actionscript, SCORM)

# Open Base Ineractive / Splash Labs

Self

**i** Jul 2007 - Feb 2011

Co-founder and chief technical lead at digital agency (previously dba "Splash Labs, LLC")

### **NuLabel Technologies**

 Worked with Director of Science to develop database-driven software systems that replaced existing spreadsheet-based workflow in use by the lab techs (Product Development, Business Analysis, DevOps, RPC Service, Programming, UI/UX Design, Java, Tomcat, Google API, Flex, Actionscript, Postgres, Python, Jenkins, Data Visualization)

#### **Demand Lending**

- Designed and developed the software systems for flagship product of a Direct Lending startup (Product Development, Business Analysis, Systems Architecture, UML Modelling, Use Case Analysis)
- Managed a team of developers to bring flagship product to market (Project Management)

#### **All Student Rentals**

- Created client-server marketplace of rental properties for the winner of the "Best Business Idea" contest at California State University (Product Development, Programming, UI/UX Design, Flash/Flex, RPC, PHP, AMF3, Yahoo! Maps, Google Analytics. HTML5)
- Integrated phone service with back-end systems to automatically detect billable leads, through the use of auto-generate extension numbers shown in the front-end app, keyed by listing and vendor ID (Programming, Systems Integration)

### Team08

- Developed Fullstack system to enabled custom snowboard designs to be created and purchased online (Programming, UI/UX Design, Flash/Flex, RPC, PHP, Magento, Databases)
- Integrated back-end database systems with CAD manufacturing systems to automatically produce working specs from the webbased designer utility in the store front-end. (Programming, Systems Integration)

### Digg.com

 Created the "DiggCharts" app which won second place in the Digg.com API data visualizations contest (Programming, Flash/Flex, UI/UX Design, Digg API, Data Visualization) North Coast Credit Union

**W2/Fulltime #** Feb 2006 – Jun 2007

Loan Officer at a local credit union

**HSBC** 

**W2/Fulltime A**pr 2004 – Oct 2005

Funding analyst for subprime auto loans

Capital One

Funding analyst (intern) for subprime auto loans