# Andrew Robert Cernek

#### **WORK EXPERIENCE**

## Lead Software Engineer, Product & Project Manager • Genblog

A results-driven code and consultancy startup specializing in Blockchain As A Service. 2018/02 - 2020/10 · genblog.com · Early-Stage Startup

- Designed and implemented a privileged, decentralized, hybrid blockchain persistence layer to provide both the transparency and immutability of blockchain technologies as well as the functionality expected of modern web applications. Stack included PostgreSQL, Hyperledger Fabric, AWS QLDB, Neo4j, Docker, and AWS KMS.
- Designed, developed, and deployed all web APIs using NestJS, AuthO, AWS SNS, and Jest to provide data, auth, and notification services to web and mobile applications.
- Built robust CRON services to integrate with third-party bank and title software.
- Facilitated security audit and obtained a \$1MM cyber insurance umbrella.
- Guided the development and launch of multiple front end applications in ReactJS.
- Managed, developed, and launched several Proof of Concept and production projects.
- Worked closely with stakeholders to understand and model traditionally low-tech business domains, to collaborate towards solutions to complex problems, and to manage expectations around the realities of emergent blockchain technologies.
- Established and enforced code quality, testing, and documentation standards by encouraging open communication and conducting interactive code review.
- Employed agile methodologies to guide and manage project planning and execution.

#### Healthlog

Providing provenance and transparency for nutraceutical products from seed to shelf. <u>healthlog.com</u> • Proof of Concept, Acquired

## Realblog

Blockchain-based wire fraud protection for title insurance agencies and their customers. realblog.io · Launched

# Senior Software Engineer, Engineering Manager · Sweetbridge

Unlock the value in assets, commerce, and supply chains with smart contracts. 2017/07 - 2018/08 · sweetbridge.com · Early-Stage Startup

- Designed, built, and deployed over twelve business-critical services, web applications, websites, and databases which were responsible for crowdsourcing \$17MM in funding. Technologies included ExpressJS, PostgreSQL, MongoDB, and ReactJS.
- Greatly improved core service performance by implementing microservices in AWS Lambda, providing more fine-grained load balancing of resource intensive processes.
- Implemented security features including best-practice PII handling, DDoS protection, image recognition, token-based authentication, and security-optimized SPA  $_{Flagstaff,\,AZ}$  . 2005 architecture to ensure the highest level of customer safety in a crypto environment.
- Grew the engineering team from two to thirteen ICs in less than two years across five different countries while maintaining a high degree of test coverage and code quality.
- Navigated the company through a successful pre-launch security audit (Trail of Bits).
- Ensured compliance with international KYC, GDPR, and security regulations.

Phoenix, AZ & Remote https://cernek.dev /in/andrewcernek github.com/Numose

#### **TECHNICAL SKILLS**

TypeScript, JavaScript NodeJS NestJS, ExpressJS SQL, PostgreSQL, AWS RDS MongoDB, Neo4i Amazon QLDB, Reddis Hyperledger Fabric Docker ReactJS, Angular(JS) GatsbyJS, NextJS HTML, CSS / SCSS / SASS Jest / Mocha / Chai / Jasmine AWS SNS, AWS KMS, AWS S3

#### **TECHNICAL INTERESTS**

Golang, Python, F#, C# GraphQL NewSQL, Event Source **API** Design Database Design System Design **Design Patterns** Functional & OOP Paradigms Testing, Documentation

#### **COMMUNITY**

Mentor, Galvanize Phoenix, AZ · 2018

# **EDUCATION**

Northern Arizona University Bachelor of Arts

## Senior Software Engineer · Really Simple

An apparel marketplace leveraging automation to streamline the customer experience. 2016/12 - 2017/06 • Early-Stage Startup, Acquired

- Improved the functionality, reliability, and developer experience of the proprietary computer vision software which automated the customer checkout process.
- Expanded software capabilities to integrate with over ten third-party retailers.
- Led the local and offshore engineering teams through the successful launch of the marketplace application on both web and mobile (Angular JS, HTML, CSS).
- Built all internal tooling, management, and reporting applications for stakeholders.
- Migrated code base from JavaScript to TypeScript and established quality standards.

## Software Developer, Founder · Various

Worked as a software development contractor for several businesses. Founded a software development startup which successfully launched two applications.

## Software Developer, Project Manager · SpyFu

Analytics, tracking, and reporting tools for search marketers. 2012/01 - 2015/07 • spyfu.com • Mid-Stage Startup

- Spearheaded the complete rewrite of the core product from Web Forms to single page architecture to improve performance and usability (BackboneJS, ASP.NET C#).
- Developed several internal business tools including a CRM web application and a retention and sales metrics dashboard (ASP.NET C# MVC, jQuery, HTML, and SASS).
- Increased the conversion rate of the company's purchase pipeline by rebuilding the sales funnel and creating dynamic landing pages.

### **PROJECTS**

#### Creator · StackTrends

2015/07 - 2016/12

A web application that tracks and curates trends in software engineering. 2016/11 - Present  $\cdot$  stacktrends.dev

- Designed, developed, deployed, and maintained a web application used by thousands of software engineers worldwide to research engineering trends and statistics.
- Built custom web scraping software to extract and store 150k job listings per month using TypeScript, NestJS, NodeJS, Jest, and PuppeteerJS.
- Designed and implemented PostgreSQL database schema to efficiently store more than 3MM job listings and 28MM relations including locations and technologies.
- Composed scripts to aggregate, interpret, and structure data for injection, pre-rendering, and hosting via ReactJS, Gatsby, and AWS S3.