catwebm.com    +1-931-998-0046    **Adam Mischke** mischke@protonmail.com    github.com/vanities

## SUMMARY

- **S**t*r*ng work ethic Full-stack Engineer that learns quickly and is a committed team player. Has 4-years of startup experience working in an agile and TDD environment. Served in the United States Navy as a Network Administrator.

## EDUCATION

- **Middle Tennessee State University**                                                    Murfreesboro, Tennessee
  *Bachelor of Science - Computer Science; Minor in Mathematics*                    *July 2014 - June 2018*
  ***Awards / Memberships:*** *Dean's List 2014-2018, Member of Association of Computing Machinery (ACM), Member of the Upsilon Pi Epsilon Computer Honor Society*

## SKILLS

- **Languages**:    Python, Swift, JavaScript, C++, SQL, Bash, Solidity
- **Frameworks**:    Django, Flask, NodeJS, React, SwiftUI
- **Tools**:    Docker, Terraform, GIT, PostgreSQL, Fastlane
- **Platforms**:    Mac, Linux, Web, iOS, AWS, GCP, Firebase
- **Soft Skills**:    Leadership, Problem Solving, Strong Communication Skills, Time Management

## EXPERIENCE

- **FunFunFun Inc. - Gen Z Dating**                                                                      Remote
  *Full-stack Engineer (Full-time)*                                                        *May 2020 - June 2022*
  - **First Engineering Hire**: Created a live updating video dating app that integrated with TikTok with over 10,000 users, where users could like, match, and message each-other.
  - **Backend**: Built a Django and GraphQL and a matching algorithm to pair users together with alike parameters.
  - **Frontend**: Deployed a complete SwiftUI app from the ground up to app store. Contributed to an internal Typescript React webpage to police uploaded media and content used by admins.
  - **DevOps**: Used GitHub actions to create an CI/CD pipeline for the backend and iOS using fastlane for multiple environments.
  - **Algorithms**: Created a series of Firebase, Firestore, and Google Storage Typescript triggers to create a video processing pipeline that asynchronously cut over 8,000 videos.
- **Coinmine - Crypto Mining Made Easy**                                                              Remote
  *Software Engineer (Full-time - Part-time)*                                              *May 2018 - Current*
  - **First Engineering Hire**: Built and maintained mineOS, an Arch Linux-Based Operating System, onto a small form factor computer that mined 6 different cryptocurrencies 24/7 that users could plug and play at home.
  - **mineOS**: Fabricated the build and deployment tools for distributing mineOS images through a test and build pipeline for over 5,000 miners.
  - **Backend**: Used Agile, Extreme Programming and Test Driven Development methodologies to deploy, update, and configure a Django based backend with over 8,000 users.
  - **DevOps**: Arranged and operated analytical, deployment, and pipeline tools such as: CircleCI, Code Climate, Datadog, and Sentry.
  - **Frontend**: Collaborated with React Native Engineer to build smooth frontend experience between API and Coinmine machine.
  - **Leadership**: Worked with overseas distribution centers to construct and create Standard Operating Procedures (SOP) for assembly and manufacturing.
- **Caterpillar Financial Services Corporation**
  *Information Services - Network Team (Intern)*                                          *May 2017 – July 2017*
  - **Leadership**: Led research, meetings, and recommended the replacement of a network team application. Worked as liaison between team members and company solutions. Then sought out quote to be implemented into the yearly budget.

  - **Problem Solving**: Researched and developed a web dashboard that displayed global network information with Python and Flask using a SQL database. Used JavaScript, J-Query, Bootstrap, AJAX, and Google Charts to form a coherent and simple-to-use website. Implemented a search function that integrated with database calls to speed up information flow.
- **United States Navy**
  *Fire controlman (FC2) - Computer and Network Technician (Full-time)*                    *July 2008 - July 2014*
  - **Leadership**: Efficiently led as work center supervisor, 8 personnel in accomplishing over 1,634 maintenance actions with a 94% maintenance accomplishment rate, managing 372 maintenance checks and repairs.
  - **Security Clearance**: Held a Secret Clearance and handled the Electronic Key Management System, which managed 106 classified software programs and hardware systems.
  - **Preventative & Corrective Maintenance**: Upkeep and corrective maintenance of the Ship's Self Defense System, Open architecture network server and computer systems, Battle Force Tactical Trainer network, and Cooperative Engagement Capability LAN.
  - **Teamwork**: Assisted in the successful overhaul of 3 major system installs with lead engineers to include: Hardware, software, and network installation, troubleshooting to the perfection of the system.

## PROJECTS

- **Vison - multimedia search engine (NLP, Search Engine, Web Crawlers, Multimedia Processing)**: (Work in progress) Research oriented, open source, search engine for bringing reverse multimedia search to small & mid scale enterprises. Tech: Python, NodeJS, Intel OpenVino Toolkit, Selenium, TensorFlow (October '18)

- **Reinforcement Learning based Traffic Control System (Reinforcement Learning, Computer Vision)**: AI model to resolve city traffic around 50% faster. Tech: Python, Alibaba Cloud, Raspberry Pi, Arduino, SUMO & OpenCV. (August '18)

- **Panorama from Satellite Imagery using Distributed Computing (Distributed Computing, Image Processing)**: Images clicked using drones, provided by ISRO were stitched together using distributed public compute nodes, effectively bringing down processing time exponentially. Tech: PHP, C++, Java, Python (March '18)

- **Drag-n-drop machine learning learning environment (Web Development, Machine Learning)**: Scratch like tool for implementing machine learning pipelines along with built in tutorial for each concept. Tech: Python, JavaScript (September '18)

- **Search Engine and Social Network(Web Development, Web Crawler, Search)**: Created from scratch a social network and a search engine based on the idea of integrating Facebook and Google. The launched website was among top 1000 websites in India during 2012-2013. Tech: PHP, MySQL, HTML, CSS, WebSockets, JavaScript, RSS, XML ( May '12)