# **Nicolas Patil**

## **Education**

# University of California, Santa Cruz09/2021 – 06/2023B.S Computer ScienceSanta Cruz, CA

## **Professional Experience**

# Security Automation Engineer

Prototyped and deployed a Terraform stack for a MySQL RDS instance within the
company's VPC, designed with least privilege principles. The architecture encompassed
security groups, subnet configurations, and IAM roles, meeting compliance standards
and speeding up future development

 Automated user membership collection for user management auditing, integrating with the **Jira API** to assign tickets containing group membership data to relevant employees to reduce time during auditing process by over 40%

## **Security Automation Intern**

**DNAnexus** 

• Developed, deployed, and optimized auditing tool built using **Python** using **Terraform**, integrating with security/auditing services like **Okta** to streamline the security compliance process by automating extraction of data from various security reporters and tools, saving the ITSec team 2 hours daily

# Founder/Software Engineer

Genie

- Designed, implemented, and successfully deployed a full featured, roundups-powered student loan payback app, integrating with **Plaid**, **Stripe**, and **Dwolla**, with over \$15,000 saved for 150 users
- Won Audience Favorite award at USC TroyLabs Launch event after presenting alongside fellow founders, earning \$1000 for our business
- Architected and implemented a scalable, **Docker** containerized **Flask/NoSQL** backend built on **AWS EC2** and **Lambda**, providing a secure interface for mobile app and automating financial data collection and subsequent payments, with over 98% uptime
- Launched **Firebase** authenticated iOS/Android apps developed using **SwiftUI** and **Java**, with a 4.9 rating on the App Store

## **Software Engineer Intern**

RSTOR (acquired by PacketFabric)

- Worked in tandem with a seasoned cloud-industry software architect to develop a
  distributed cloud orchestration solution, allowing for secure remote container execution
  on unsecured machines using **Singularity** containers
- Configured and implemented main data transport using **Go** and **MQTT**, allowing for content-blind communication between orchestrating scheduler and compute instances

# **Software Engineer Intern**

RSTOR (acquired by PacketFabric)

- Designed and built frontend for company-wide demo of cloud orchestration prototype, using **React** and later replicating using **Angular**
- Assisted in company's receiving interim funding through presentation of prototyped cloud orchestration product

### **Skills**

#### Languages

Golang, Python, C++, C, JavaScript, SQL, Terraform, Haskell

#### Frameworks & Tools

Flask, AWS (Lambda, DynamoDB, EC2, S3, RDS), Vercel, Github/Gitlab, GCP (Firebase, Firestore), Docker, React, Tensorflow, Pytorch

09/2022 – 09/2023 Mountain View, CA

06/2022 – 08/2022 Mountain View, CA

07/2020 – 12/2021 Saratoga, CA

07/2020 – 09/2020 Saratoga, CA

07/2019 - 09/2019