# Aarushi Upadhyaya

703-713-2947 | aarushi.e.upadhyaya@gmail.com | github.com/rushiu | github.com/aarushiuz | linkedin.com/in/aarushi-upadhyaya

#### **EXPERIENCE**

#### Software Engineer 3 | ZipRecruiter Inc.

Aug 2023 - Present

- Promoted from Software Engineer 2 to Software Engineer 3 in September 2024
- Built high-scale backend systems that process 15–20 million daily outbound email and SMS messages, using Flink, Spark, Kafka, ProtoBuf, Spring Boot, gRPC, REST APIs
- Led design and delivery of key features in a centralized messaging platform, like message detail hydration and cross-team integrations, **improving scalability**, **reducing latency**, **and enhancing user experience**
- Optimized infrastructure in **Go**, streamlining eligibility processing and ensuring compliance with legal requirements, resulting in a 7× increase in SMS audience and significant growth in user engagement
- Spearheaded A/B testing infrastructure to automate experimentation, reducing development time **from 1 week to 1 hour**; Implemented experiments in **Scala**, **Java**, **and Python**
- Dedicated 20% time to ZipRecruiter's Data Guild, contributing infrastructure for company-wide data governance
- Mentored engineers, led knowledge-sharing sessions, and improved documentation to foster collaboration and streamline workflows; Participated in on-call rotations

# **Software Engineering Intern | Meta**

May 2022 - Aug 2022

- Implemented an automated ML model performance monitoring system using recurring data pipelines in **Python**
- Trained ML models to optimize infrastructure performance while maintaining existing prediction metrics

# **Summer Analyst | Accenture Consulting**

Jun 2021 - Aug 2021

• Integrated **Adobe's** Real-Time Customer Data Platform into existing suite to improve customer personalization

## Full Stack Engineering Intern | Entefy Inc.

May 2020 - Aug 2020

• Entery is an advanced AI and process automation company. Organizations use Entery's multisensory AI platform to accelerate their digital transformation to dramatically improve everything from knowledge management to process automation, cybersecurity, data privacy, customer analytics, forecasting, and more.

#### **Software Intern | Hexaware Technologies**

Jul 2017 - Aug 2017

• Coded an employee survey website using **Django**, **Python**, **HTML**, and **SQLite** 

#### **EDUCATION**

## Purdue University - Computer Science Honors B.S. | West Lafayette, IN | GPA: 3.84/4.0 Aug 2019 - May 2023

• Specializations: Machine Intelligence & Security, Certificate in Entrepreneurship, Dean's List & Semester Honors PROJECTS

## Preserving Image Privacy with OPA: One Predict All for Efficient Deployment

Jan 2023 - May 2023

• Investigated methods to quantify image privacy protection to evaluate a model against state-of-the-art research

#### Student Researcher at Cam2 TensorFlow Model Garden (Google Partnership)

Jan 2022 - May 2022

• Contributed **Python**-based ML model implementations to a Google-partnered open-source repository, translating **PyTorch** models to **TensorFlow** to exemplify best practices for ML development

#### Circal (Boilermake Hackathon Winner & Startup Accelerator-funded)

Jan 2020 - Jun 2021

• Conceptualized and programmed automatic calendar scheduling app using React and Node.js

#### Thomas Jefferson HS for Sci/Tech Research Project in Computer Systems Lab

Aug 2018 - Jun 2019

• Achieved 75% facial recognition accuracy on 40 subjects using **Python's Tensorflow, Keras, numpy, dlib, pandas** libraries. Wrote research paper/poster and presented at tjSTAR Research Symposium

#### **Misc. Projects:**

2015 - 2023

- Coded OpenCV methods from scratch in C++ and utilized OpenCV library to process and append onto images
- Developed autonomous navigation software for miniature vehicles using LiDAR, wall and colored line following, PID and potential field controllers, and AR tag/image recognition in **Python**
- Programmed a Shell in C to parse complex queries including RegEx and built a Java code compiler in C

#### SKILLS

Languages: Python, Java, Scala, C, C++, Go, JavaScript, TypeScript, SQL, HTML/CSS

**Frameworks & Tools:** Spark, Flink, Kafka, ProtoBuf, Spring Boot, Node.js, React, Express, Tailwind, gRPC, REST, Prometheus, Twilio, Mailgun, Kubernetes, Docker, Argo, Terraform

Databases & Stores: PostgreSQL, MySQL, SQLite, DynamoDB, Parquet, Delta, Redis

**Relevant Coursework:** Machine Learning | Artificial Intelligence | ROS | Computer Vision | Cryptography | Compilers | Operating Systems | Analysis of Algorithms | Parallel Computing | Computer Architecture | Web/Mobile App Development | Vector Calculus | Linear Algebra | Statistics | Probability