NALIN MEHRA

Gainesville, FL \cdot nalinm01@gmail.com \cdot (813) 420-0085 \cdot www.nalinmehra.com

EDUCATION

University of Florida

Gainesville, FL

GPA: 3.89 / B.S. in Computer Science

Expected May 2023

Involvement: Google Developer Student Club, Competitive

National Merit Scholar

Programming Club, ACM, Software Engineering Club

SKILLS

Languages: Python, C++, PHP (Hack), Golang, JavaScript, Java, SQL, C#, Lua

Technologies: React, GraphQL, Flask, Apache Thrift, Hive, Spark, Elasticsearch, AWS, Linux CLI, Docker, Git

EXPERIENCE

Meta (formerly Facebook)

Seattle, WA

Software Engineering Intern - AI Infrastructure (Privacy Enforcement)

May 2022 – August 2022

- Launched an internal tool for adding privacy policy annotations on Feature Store feature groups to meet privacy compliance. Estimated savings of 4500 engineering hours (90% improvement from existing process).
- Designed schema for XDB (MySQL) backed annotation entities accessed by new GraphQL endpoint.
- Deployed daily pipeline to annotate feature group policies in production and update feature group metadata.
- Architected Python API to ingest feature groups and automatically infer and annotate privacy policy by analyzing feature lineage data flow from various AI Metadata data sources. Maintained 90%+ test coverage.
- Improved Feature Store's C++ computation engine pipeline to verify privacy policy when indexing features.

American Express

Phoenix, AZ

Software Engineering Intern - Enterprise Data Architecture and Artificial Intelligence June 2021 - August 2021

- Developed and deployed Random Forest (RF) model for the Feature Store team to gain additional data insights for internal auto-feature engineering tool and improve AmEx data science pipeline.
 - Populated and queried Elasticsearch database to store and retrieve data using Flask REST API.
 - Trained and tuned RF hyper-parameters to achieve 93% model accuracy using cross-validation techniques.
 - Created user-friendly portal using React to provide feedback for reinforcement learning on NLP model.
- Performed unit, functional, and integration testing for backend API using Postman and Python.

Raytheon Technologies

Dallas, TX

Computer Engineering Intern - Radar Processing and Testing

June 2020 – August 2020

- ullet Developed firmware for and tested radar processing cards used in F-15 fighter jet radar system using Lua.
- Reduced Circuit Card Assembly (CCA) test station operation time ~10% by sourcing FPGA card control data with TCL scripting to automate clock frequency verification test.
- Utilized C# to program, test, and verify functionality for the Optical Controller Module (OCM).
- Developed C# GUI to interact with and display information from the OCM.

UF Dream Team Engineering

Gainesville, FL

EPIC App Developer

January 2022 – Present

- Co-developed Flutter mobile app to allow patients to share vital signs data with their doctor in collaboration with UF Shands Hospital. Adhered to HIPAA compliance standards.
- Improved input screen by adding user-friendly selection of vitals and measurements to record.
- Migrated existing app codebase from Flutter 1.0 to Flutter 2.0, fixing null safety and type check issues.

Personal Projects

Newtts - Notes Scanner with Audio Review

Jan 2022 – May 2022

- Co-developed Flutter iOS/Android app to take pictures and read handwritten notes using Google ML Kit.
- Implemented file system solution, various import formats, and notes viewer for manual review.
- Developed notes audio playback feature for improved review and user convenience.

Sentimental Critics - Natural Language Processing Project

April 2021

- Developed a new rating system for restaurants using sentiment analysis.
- Utilized Selenium and BeautifulSoup4 to scrape google reviews for training and testing data of model.
- Trained and tested machine learning model (Naive Bayes) to calculate a rating from written reviews.

AWARDS

Herbert Wertheim College of Engineering Dean's List

Fall 2019 - Spring 2022

Awarded President's Honor Roll or Dean's List at the UF College of Engineering.

Florida Benaquisto Scholarship Recipient

August 2019 – Present

Full-ride merit based 4 year scholarship to the University of Florida.