# NISHA RAMANNA

New York, NY | (615) 788-4556 | nisha.ramanna@nyu.edu | LinkedIn | GitHub | Portfolio

#### **EDUCATION**

## New York University, New York, NY

August 2020 - Present

Master of Science, Computer Science (Expected May 2025)

Artificial Intelligence/Machine Learning Concentration | Overall GPA: 3.89

Bachelor of Science, Computer Science (May 2024)

Overall GPA: 3.83

## **SKILLS**

Python, C, C++, JavaScript, Java, PyTorch, Keras, TensorFlow, Scikit-Learn, Pandas, NumPy, SQL (MySQL and PostgreSQL), Node.js, Flask, React, HTML, CSS, Bootstrap

## **EXPERIENCE**

Incoming Data Engineering Intern, Peacock, New York, NY

Expected September 2024 – May 2025

May 2024 – Present

Software Engineering Intern, John Deere, Chicago, IL

- Leveraged **Power BI** for data visualization, supporting data-driven decision-making processes in the ML & AI organization
- Developed task management software using Microsoft Power Platform, resulting in annual savings of \$80,000
- Advised clients on how to utilize and implement AI & ML technologies to meet their needs

Machine Learning Researcher, New York University, New York, NY

August 2023 – May 2024

- Formulated a machine learning algorithm for semantic analysis using TensorFlow, achieving an accuracy of 88%
- Authored and secured acceptance of a **research paper at ASEE's 2024 Conference**, enhancing the visibility of the research *Software Engineering Intern*, **Humana**, Louisville, KY

  May 2023 December 2023
  - Engineered an automated security scan application in JavaScript/Node.js, reducing annual costs by \$87,000-\$162,000
  - Enhanced app performance by integrating Microsoft Azure, creating a scalable infrastructure and improving response times
  - Established a cloud-based Postgres database using Docker, improving data access efficiency by optimizing storage structures
  - Led a team of 3 in implementing CI/CD and agile practices, streamlining the software development lifecycle

Head of Inclusion, Diversity, Belonging and Equity, NYU General Engineering Department, New York, NY April 2023 – Present

- Spearheaded the creation and deployment of a new IDBE curriculum, educating ~600 NYU freshmen annually on the topic
- Design and conduct IDBE training for 120+ faculty and teaching assistants, enhancing inclusivity across the department

Teaching Assistant, NYU General Engineering Department, New York, NY

August 2022 – Present

- Review and debug students' code; provide constructive feedback to improve programming and troubleshooting skills
- Guide students through implementing software and hardware integration tasks, improving project quality and technical rigor

#### **PROJECTS**

# **Deforestation Detection**

March 2024 – May 2024

- Developed a machine learning model to detect deforestation, mining data from Google Earth Engine for satellite images
- Implemented a **K-Means clustering** algorithm to identify deforestation patterns

#### **MediConnect**

February 2024 – May 2024

- Constructed a medical record management web application, using HTML, CSS, Python, Flask, and SQL
- Implemented a robust SQL database using Google Cloud Platform and Google Storage for efficiency & stability
- Created a chat system and scheduling feature, improving communication between patients and healthcare providers

# **Borough Books**

December 2023

- Programmed a React-based web app that fosters community engagement in NYC, winning "Best NYC Hack" at HackNYU
- Integrated JavaScript's Leaflet library to allow users to mark significant spots, enhancing local cultural interaction
- Enhanced user security by implementing **Firebase** for authentication, boosting user trust with reliable login mechanisms

#### Ask Dibby

September 2023 – December 2023

- Constructed a deep learning chatbot using TensorFlow and Keras to assist NYU students with printer troubleshooting, winning first place at NYU's semester long Hack Dibner competition
- Designed system architecture to integrate chatbot with NYU's existing software, helping staff track and resolve printer issues in real time and improving campus IT support systems

# **ACTIVITIES**

# President, Association for Computing Machinery for Women

August 2022 - Present

- Increased membership by 60% through coordinating chapter's event management, marketing, and finances
- Led workshops on HTML, Bootstrap, and Data Structures to 60+ students, fostering learning and collaboration
- Organized and mediated panels with industry professionals to provide insights on career development

# Media Lead & Electronics Team Member, NYU Motorsports

August 2022 – Present

- Formulated vehicle's real-time data and analytics suite by developing dashboard software with PyGame and Python
- Developed and maintain a cloud-based data analytics application using Heroku, Digital Ocean, Docker, and Grafana

### **AWARDS**