

Vikas Reddy

(510)-850-8806 | vikasreddy2313@gmail.com | [linkedin.com/in/vikasreddy85/](https://www.linkedin.com/in/vikasreddy85/) | github.com/vikasreddy85

EDUCATION

Johns Hopkins University

Jan '25 – May '26

Master of Engineering in Computer Science

Relevant Coursework: Machine Learning, Deep Learning, Computer Networks, Advanced Human-Computer Interaction

University of Maryland - College Park

Aug '21 – Dec '24

Bachelor of Science in Computer Science

Relevant Coursework: Object-Oriented Programming, Algorithms, Advanced Data Structures, Artificial Intelligence, Computer Vision, Data Science, Computer Architecture, Programming Handheld Systems, Web Application Development

WORK EXPERIENCE

UMD Computational Sociodynamics Lab

Aug '23 – Jan '25

Research Assistant

- Built a real-time news credibility assessment tool for the social media platform Bluesky using Python and PostgreSQL.
- Engineered a real-time WebSocket server, utilized the AT Protocol to monitor live post activity, and incorporated NewsGuard ratings for a comprehensive assessment of news provider credibility.
- Ensured robust functionality and data integrity through rigorous testing using industry-standard tools such as Postman.

VoicePing

May '23 – Aug '23

Natural Language Processing (NLP) Intern

- Fine-tuned OpenAI Whisper to enhance real-time speech-to-text transcription accuracy for Japanese and Vietnamese.
- Achieved remarkable accuracy improvements, achieving a word error rate of 6.97% for Japanese and 7.33% for Vietnamese.
- Conceptualized, designed, and developed a cutting-edge prototype web application utilizing FastAPI, Next.js, and Firebase.

Breakerspace Lab

Jan '23 – May '23

Research Assistant

- Created a web plugin for Mozilla Firefox to find data lost before the transactional period of a website's connection to a server.
- Built the plugin using the webRequest API and JavaScript to get detailed information on the TLS connection.
- Researched potential web security risks during the initial stages of the web connection to evaluate potential plugin features.

PROJECTS

MelodyMatch

October '23

Music Recommendation Application

- Developed a music recommendation system using Python and TensorFlow, employing techniques such as data preprocessing, RNN, Triplet Loss Model, and the K-nearest neighbors algorithm, while leveraging a dataset of 10,000 Spotify playlists.
- Presented research project at the FIRE Summit symposium poster session to 200+ undergraduate students.

My-Fitterp-Pal

April '23

UMD Dining Hall Meal Planner Application

- Developed a meal planning app that generates daily meal plans based on students' fitness goals and dietary preferences.
- Implemented a user-friendly front-end interface using React.js and a robust back-end system using Node.js and Express.js.
- Presented the application to 1000+ attendees at the UMD Bitcamp Hackathon, showcasing the app's features and functionality.

ACTIVITIES

Google Developer Student Club | Operations Lead

Aug '21 – May '24

- Promote curiosity among 500+ registered undergraduate students by hosting hands-on workshops and project-building activities relating to innovative technologies like Git, Flutter, and Google Cloud Platform.
- Create an in-depth, full year curriculum and management plan that allows the club to be self-sustainable.

UMD Hack4Impact Club | Software Engineer

Sep '22 – May '23

- Worked in a team of student engineers, designers, activists, and humanitarians to build software for nonprofits.
- Developed a student tutoring management portal for RISE DC, a non-profit providing educational services to 300+ low-income youth in Washington, DC, using React.js, Typescript, and Firebase.

SKILLS

Programming Languages: Java, Python, C, JavaScript, Typescript, PHP, Dart, HTML/CSS, SQL

Frameworks/Services: AWS, Azure, GCP, Docker, Firebase, React.js, Next.js, Express.js, JUnit, Git, GitHub, Linux

Spoken Languages: English, Japanese, French, Telugu