Shatakshi Ranjan

shatakshiranjan02@gmail.com | +1(609)721-5507 | GitHub: ShatakshiRanjan | LinkedIn: shatakshi-ranjan

Education

Bachelors of Science in Computer Science & Information Technology and Informatics *Sept. 2021 – May 2025*
Rutgers University–New Brunswick - New Jersey, USA *GPA: 3.76, magna cum laude*

- **5x National Collegiate Hackathon Winner** - recognised for technical innovation and execution of real world problems
- Technical focus in **full-stack development, AI/ML, and data-driven system design**

Professional Experience

Software Engineer *New Jersey, USA | July 2025 - Present*
Maestro Technologies

- Designed and implemented a scalable **SLA-based ticketing system in Java** to track, prioritize, and resolve customer issues, automating SLA deadline monitoring and escalation workflows
- Developed RESTful APIs and integrated with Snowflake to enable real-time ticket updates, reducing average response time by **40%** and improving service compliance
- Built a responsive web dashboard with Java-based backend (SpringBoot) and modern frontend frameworks to display ticket statuses, SLA metrics, and analytics for managers

Software Engineer - Coding and Social Lounge (CSL) *New Jersey, USA |Sept. 2023 - May 2025*
Rutgers University - Computer Science Department

- Founded, engineered, and deployed the **CSL Queue System**, a full-stack platform **(React, Node.js)** with CI/CD automation via GitHub Actions; served 1,000+ students/semester and **reduced wait times by 65%**
- Built real-time syncing with **Google Forms API** for automated intake and integrated analytics to track course demand, peak hours, and repeat visitors - enabling data-driven staffing and operational insights
- Secured **$100K in funding** by positioning the queue system as a department-wide solution for academic support
- Mentored 130+ students each semester in debugging and CS concepts while maintaining and troubleshooting 50+ remotely accessed Linux servers supporting coursework and faculty research

Cyber Security Intern - Data Division *Mumbai, India | June 2024 - August 2024*
Reliance JIO

- Developed **Taskify**, a secure task and project management portal using **Flask and MySQL**; implemented audit logging and access control to **improve team productivity and data traceability by 45%**
- Designed a **MySQL-backed** chat platform with automated timestamp archiving to reduce communication overhead
- Demonstrated secure big data pipeline automation with **Apache NiFi, Hadoop, and Spark** to senior engineers, highlighting potential for **30% reduction in manual processing** and improved data reliability through encryption
- Implemented user authentication and conducted **SAST/DAST** vulnerability assessments to ensure InfoSec compliance

Leadership & Involvement

Marketing Director (May 2022 – May 2023), HackHERS Director (June 2023 – Dec 2023)
Women in Computer Science (WiCS), Rutgers University

- Directed HackHERS, NJ's largest femme, female, and non-binary hackathon; drove outreach and **secured $26K+ in sponsorships for 200+ attendees**
- Collaborated with a 20-person team to execute event logistics, speaker coordination, and attendee experience
- Ran social media campaigns and automated weekly mailing lists to boost event attendance and engagement
- Built and maintained **responsive websites for WiCS and HackHERS**, collaborating cross-functionally with other directors to centralize event information and enhance digital visibility.

Projects

Collaborative Filtering-based Recommendation System Python, Numpy, Pandas, Scikit-learn

- Built a personalized recommender using MovieLens, **achieving MAE of 0.7393 and RMSE of 0.9501** through data imputation, feature scaling, and model tuning; similar to market basket systems used in e-commerce
- Integrated genre-based filtering and anonymized user data to enhance explainability and user trust
- Selected among the **top 20 projects** out of 110 for department seminar; presented via **slide deck**

Mama's Garden – Smart Plant Monitoring System Python (Flask), MongoDB, Gemini AI

- **Best Social Good Track Winner** at *HackHERs 2025*, recognized for impactful AI-driven sustainability solutions
- Developed API integrations with MongoDB and Gemini AI to process and visualize live IoT sensor data (e.g., humidity, temperature) using Flask and Matplotlib
- Built a RESTful API to connect frontend and backend with synchronous data flow and error handling

Stock Trading Algorithm ThinkOrSwim Script

- Built a trading algorithm using MACD and RSI indicators, **achieving 45% accuracy** in real-time conditions
- Automated technical analysis with graphical indicators to generate data-driven trading signals
- Implemented stop-loss and take-profit mechanisms to improve risk management and trading efficiency

Technical Skills

Programming & Development: Java, Python, JavaScript/TypeScript, React, Vue.js, Next.js, Node.js, Unity, Git, Spring Boot, Docker, Flask, Django, Tailwind CSS, Postman, UI/UX (Figma), REST API Development, Microservices
Data & Machine Learning: Big Data (Hadoop, Spark), MongoDB, SQL, MATLAB, Matplotlib, Numpy, Scikit-Learn, Pandas, TensorFlow, Tableau, OpenCV, MediaPipe
Systems & Cloud Platforms: Windows, Linux/Unix, PowerShell, Apache, Google Cloud, AWS, CI/CD (GitHub Actions)