Venkata Narasimha Sai Uday Gattupalli

Stony Brook, NY | saiuday.gvn@gmail.com | Portfolio | 934-221-8552 | linkedin.com/in/gvn-saiuday/ | GitHub

EDUCATION

Stony Brook University   **Stony Brook, NY**
Master of Science in Computer Science in Computer Science, GPA: 3.95   *Aug 2022 – May 2024*
Positions: Graduate **Teaching Assistant** for Introduction to Networking
Coursework: Visualization & Visual Analytics, Database Systems, Artificial Intelligence, Computer Networks,
          Computer Vision, Data Science, Data Simulation & Modeling

Indian Institute of Technology Bhilai   **Raipur, India**
Bachelor of Technology in Computer Science & Engineering, GPA: 3.82   *Jul 2017 – May 2021*

SKILLS

Skills: Machine Learning, Artificial Intelligence, Data Mining, Full Stack Development, Database Design, Information Retrieval, RESTful APIs
Languages: Python, C++, Java, C, JavaScript
Development Tools: Flask, SQL, NoSQL, fast.ai, Node.js, React.js, React Native, MongoDB, Git, Docker, Kubernetes, AWS, GCP, Jira, Confluence, Elasticsearch, Postman, PyTorch, Tensorflow, Redis, HTML5, CSS3, Shell Scripting, Agile Methodology, D3.js, DB2, Terraform, Ansible, CI/CD Pipelines

WORK EXPERIENCE

Canon U.S.A   **Melville, NY**
Software Engineer Intern   *Jun 2023 – Aug 2023*
- Engineered an **interactive data visualization dashboard React.js & D3.js front-end** with **Python Flask back-end** for Canon's e-commerce, boosting insights into marketing opt-ins and product registrations by 25%.
- Devised optimized data extraction strategies to **preprocess over 10M+ GCP logs** from various business systems at Canon efficiently, employing data transformation techniques to ensure seamless rendering in the frontend visualizations.
- Employed **Google Cloud Platform services for deployment**, resulting in a 50% boost in real-time interactivity and user-responsive data exploration on Canon's e-commerce site.

Sterlite Technologies   **Gurugram, India**
Software Development Engineer   *Jul 2021 – Jul 2022*
- Researched, developed, and integrated **network switch features** into SONiC, aligning with current market standards, contributing to a 20% expansion of functionality.
- **Documented all the findings of function call flows** between different containers in SONiC onto Confluence, thereby reducing the training time for new employees by 30%.
- **Mentored 10+ new employees with the prerequisites** related to Network Operating Systems, SONiC, Docker, and other tools used in the project reducing the onboarding time for the Edge Computing team (recently acquired by Ciena).

Max Secure Software   **Pune, India**
Software Engineer Intern   *May 2020 – Aug 2020*
- Implemented a **Convolutional Neural Network model for malware detection** which classified malware into their respective families with an accuracy of 98% & hosted the model in an AWS cloud environment.
- Enhanced an open-source Windows Full Disk Encryption tool, adding features for **API linked encryption, info sharing and remote encryption by system administrators**, resulting in a 15% rise in encryption versatility.

International Institute of Information Technology Hyderabad   **Hyderabad, India**
Software Engineer Intern   *May 2019 – Jun 2019*
- Collaborated with 3 departments to design, develop, and document a **scalable & distributed web app** (Open Voice) and integrated the modules with cloud infrastructure via REST APIs to collect speech data of various Indian languages from users across the country.
- Led efficient transfer of speech data, which enabled the training of a vital Natural Language Processing model for 5+ Indian language translation in a Government project.

PROJECTS

Obesity in the US: Factors at Play
Full Stack Development
- Built a **custom-built interactive visual analytics dashboard** for analyzing and visualizing the key factors affecting the obesity rate using data from across 3000+ U.S. counties.
- **Featured in Stars of CSE 564 Spring '23 YouTube playlist by Prof. Klaus Mueller**.

Expense Tracker
Full Stack Development (MongoDB, Express.js, React.js, Node.js Stack)
- A cross platform app for iOS & android to track personal income & expenses hosted with the help of cloud infrastructure.
- Crafted a MongoDB schema to store data and generate insightful reports and graphs on weekly and monthly timelines.
- Streamlined the process of adding a new transaction from transaction alert mails using Gmail APIs.

DNS and DNSSEC Resolver
Computer Networking
- Engineered a linux like **dig tool (DNS lookup) to resolve a domain name** iteratively using dnspython to fetch A, NS and MX records. Extended this dig tool to resolve domains that have DNSSEC protocol enabled.