Shruti Varade

EXPERIENCE

Machine Psychology Fellow, Boston, MA — Research Software Engineer May 2023 – Present

- Research at the intersection of Computer Vision, Graphics, and Machine Learning for the web.
- Present project findings and research at various hackathons and conferences, showcasing the application of ML in web-based modeling and paper presentations on novel machine psychology methodologies.

TATA Consultancy Services, Mumbai, India — Software Engineer Sept 2020 - Jun 2022

- Developed SBI bank's software with Java and JavaScript, improving user experience by 20% in a year per SDLC guidelines.
- Enhanced data efficiency and automation using RESTful APIs and SQL, with Git ensuring backend integration and code integrity.
- Led mentorship to elevate interns' full-stack dev skills, achieving 95% test coverage and reducing defects through unit testing.

EDUCATION

University of Massachusetts, Boston — Master's in Computer Science Sept 2022 - May 2024 | GPA 3.88/4.0

- Courses: OODP- UML, Design Patterns, OOSD- Stream API, Concurrency, Analysis of Algorithms, User Interface Design, Comp. Graphics

Teaching Assistant for Introduction to Computing (Python), Programming in C

University of Mumbai, India — Bachelor's in Computer Engineering Jun 2016 - May 2020 | GPA 8.32/10.0

Courses: Machine Learning, Artificial Intelligence, Cloud Computing,
Database Management System, Data Structures, Operating System

PROJECTS

Boostlet.js | JavaScript

 Boostlet.js is a generic processing framework that runs algorithms wrapped as bookmarklets and supports a variety of web-based visualization frameworks.

BoxCraft.js | JavaScript

- BoxCraft.js is a JavaScript library designed to provide interactive bounding box tools for web-based applications.

GuideGenie | Python, ML, streamlit.py

 Machine learning project to recommend a professor to a student from a network of professors looking for a mentor or a guide.

Fitness Metrics Dashboard | Django, Chart.js, PostgreSQL

- Fitness Metrics Dashboard enabled users to track fitness metrics through data visualization dashboards for calories, distance, steps, and heart rate.

LINKS

linkedin.com/in/shruti-varadegithub.com/shrutivarade

SKILLS

Frontend:

HTML, CSS, JavaScript (ES6+), UI/UX, React.js, Streamlit.py, Bootstrap, xtk.js, Three.js and webGL.

Backend:

Java (JUnit5, Apache Ant), Python (Django, Flask), Express.js Node.js, C/C++, RESTful API, JSON, and XML

Databases:

MySQL, PostgreSQL, MongoDB, and AWS cloud storage solutions

Development Tools:

Git, GitHub, PyCharm, IntelliJ, VSCode

PRESENTATIONS

BostonBridge Hackathon 2024 | University of Massachusetts, Boston

Niivue Hackathon 2023 | University of South Carolina, Columbia

BrainHack 2023 | MIT, Boston

ACCEPTED PAPERS

Thuy Dao, Chris Rorden, Korbinia Eckstein, Daniel Haehn, Shruti Varade, Steffen Bollmann

Developing a secure, browserbased, and interactive image segmentation system for medical images

ISMRM - Australia and New Zealand Chapter - 2023