Yusra Suhail

Software Developer || Human Computer Interaction || Machine Learning || IT consultant
Yusra.suhail99@gmail.com || 936-320-5034 || Portfolio

PROFILE

Highly motivated and self-directed Software Developer skilled in design, programming, and debugging. Exhibited problem-solving skills through leading multiple projects as an IT consultant, Research Assistant, and a student. Exceptional detail-oriented communication ensuring high-quality work. Passionate about working on Human-Centered designs.

EDUCATION

University of Rhode Island, Kingston, RI
Master of Science in Computer Science   **May 2025**

Bachelor of Science in Computer Science, *Summa cum laude,* **minor in Cyber Security**   **May 2023**
Honors: GPA: **3.93/4.00**, Dean's List (every semester), Centennial Scholar

SKILLS

- C++, C, Python, JavaScript, Rust, Snakemake, Asteroid, Database Designing, SQL, Java, HTML, Bash Scripting, OOP
- Windows, Mac, Linux, Git, GitHub, Microsoft Office, Pandas DB, Bootstrap, Collab Notebooks, Trello
- Unit Testing, Database Management, Machine Learning, Data Structures, Algorithms, Computer Hardware, Operating Systems

EXPERIENCE

UNIVERSITY OF RHODE ISLAND
Graduate Research Assistant (Human-Centered Experiential Technologies Lab)   **August 2023 – Present**
- Collaborate with a team of four on Human-Computer Interaction research to optimize web user experiences.
- Spearhead a project using JavaScript and Rust for readability studies, customizing font preferences to enhance user experiences.
- Successfully measured character height in centimeters using JavaScript, ensuring accurate size representation across browsers for remote studies.

Graduate Research Assistant (Bioinformatics Lab)   **July 2023 – August 2023**
- Developed a specialized mitochondrial variant analysis pipeline using Snakemake within four weeks, demonstrating adaptability and rapid skill acquisition, now in effective use at the RI-INBRE bioinformatics lab.

Lead Information Technology Service Desk Consultant   **September 2021 – May 2023**
- Promoted from Consultant to Lead in two years for impactful team contributions
- Administered Azure Active Directory for URI, supporting thousands of users and leading multiple projects.
- Routinely analyzed and ascertained the department's IT needs and implemented appropriate solutions in a timely fashion

Undergraduate Research Intern   **September 2022 – December 2022**
- Refactored an application written in JavaScript using React and Redux to make the code precise, easy to read and usable for Psychology researchers to analyze data

Teaching Assistant (Social and Ethical Issues in Computing)   **September 2021 – May 2023**
- Enhanced student performance by 20% through effective grading and personalized assistance for students
- Reduced administrative workload by 30% in managing the course, efficiently coordinating meetings, grading assignments and supporting colleagues and the professor

PROJECTS

Study Stash   **August 2024**
- Created AI-powered flashcard app that generates and saves custom flashcards.
- Implemented secure user authentication and Firebase integration for data management and accessibility.

Anime Recommender System   **October 2023 – December 2023**
- Engineered an Anime Recommender System employing collaborative filtering techniques of Machine Learning
- Emphasized user-based filtering in python while exploring item-based methods for enhanced recommendation diversity

Computational Geometry   **January 2023 – July 2023**
- Engineered C++ libraries on Open GL for point and segment creation, employing Computational Geometry expertise, Object Oriented Programming and smart pointers to enable intersection detection via brute force and smart algorithm
- Utilized XCode's debugging tools to swiftly troubleshoot code errors, including segmentation faults

Universal Virtual Machine (UM) in Rust   **April 2022**
- Developed UM with 8 registers, segmented memory, I/O device, and a 32-bit program counter to parse byte level instructions

URI Memorial Union Website Redesign   **September 2021 - May 2022**
- Collaborated with a team member and redesigned school website to improve public engagement by 30% by implementing a new theme, enhancing layout, interactivity and visual appeal using HTML and Graphical User Interface