

Aditi Thanekar

☎ 510-556-7315 ✉ athan014@ucr.edu 🌐 aditithanekar.github.io 📄 [aditithanekar](#) 📌 [aditi-thanekar](#)

Education

University of California - Riverside

BS+MS in Computer Science

Riverside, California

September 2022 - June 2026

Organizations: Society of Women Engineers(SWE), Association of Computing Machinery(ACM), UCRaas

Experiences

Lawrence Livermore National Laboratory

Computing Intern | NIF

Livermore, California

June 2024 - Present

- Developed new component with C++ to group existing laser simulation components, reducing Qt cold start time 30%
- Enabled reuse of component chains across simulations reducing pipeline creation by 60%
- Worked closely with physicists to ensure the software met their functional requirements and scientific specifications
- Wrote documentation and training materials in LaTeX for users to learn to use new component
- Led live user training for ~20 people, addressing technical questions, and provided hands-on guidance

University of California, Riverside

Chief Grader | Data Structures and Algorithms - Professor Patrick Miller

Riverside, California

April 2023 - Present

- Managed gradebook for 1000+ students, and directed tasks amongst 12 people ensuring timely release of grades
- Reduced input time from 1 hr to 7 min/assignment, by creating Python program mapping scores to Canvas gradebook
- Held 4 hours of weekly in-person demos/code reviews to assess student's understanding
- Conducted over 200 C++ code reviews, grading on readability, efficiency, memory usage and best practices

Aspiring Scholars Directed Research Program

Bioinformatic Researcher | Advisor: Clinton Cunha

Fremont, California

June 2021 - November 2021

- Implemented program to normalize cancer cell data and order by p-value to find significantly expressed genes in R
- Created dot plots and gene-set enrichment maps, and found a pattern in change in taste perception phenotype
- Led meetings alongside an advisor to interpret plot data and debug code
- Presented at Global Alliance for Genomics and Health 9th Plenary Meeting and SCCUR

Projects

Packaroo Express | Python, Tkinter

github.com/aditithanekar/packarooExpress

- Devised solution to minimize crane movement for loading, unloading, and balancing containers at a port using A* search
- Developed and integrated a Python backend with a Tkinter GUI for interactive container operations with visualizations

Ray Tracer | C++, Valgrind, GDB

- Implemented ray tracer able to intersect spheres, planes and triangle meshes in 3D plane and render to a 2D image
- Integrated multiple shaders: flat, Phong(diffuse, specular, ambient), reflective, transparent, and texture mapping

My Favorite Story | C++, Git, Github, Valgrind, GTest

github.com/aditithanekar/My-Favorite-Story

- Implemented classes & tests for a choose your adventure game with horror and rom-com themes, debugged with Valgrind
- Hosted scrum meetings, completed sprints each week, and delegated tasks on a Kanban board with a team of 4

Leadership

Girls Who Code

President/ WHS Hackathon Director

Fremont, California

August 2020 - June 2022

- Created 9 lesson plans and taught web development at meetings to over 25 members using HTML, CSS and Figma
- Organized and emceed a school-wide hackathon for online(2021) and in-person(2022) and mentored groups

Washington High School Husky Band

Marching Band Drum Captain/ Wind Ensemble Percussion Section Leader

Fremont, California

August 2018 - June 2022

Technical Skills

Languages: C++, Python, Java, HTML, CSS, R, Swift

Developer Tools: Git, Github, VSCode, GTest

Design Tools: Adobe Illustrator, Figma, SolidWorks, Autodesk Maya

Relevant Coursework: Artificial Intelligence, Parallel Programming, Computer Graphics, Data Structures/Algorithms