

# Kushal Rao

12925 NW Greenwood Dr, Portland, OR 97229 | Krao9@wisc.edu | 971-221-7617

## EDUCATION

### University of Wisconsin-Madison

*Bachelor of Science*

**Majors:** Computer Science | Electrical Engineering

**GPA:** 4.0 | Dean's List

**Madison, WI**

*May 2027*

## EXPERIENCE

### Undergraduate Research Assistant

*Jexpresso developer*

**Madison, WI**

*February 2025 - Present*

- Works with a premade Julia script that renders atmospheric conditions to adapt the script to run with JACC.jl on multiple GPUs
- Collaborates with the team to enhance atmospheric rendering through advancements in the Discretized Galerkin method

### Undergraduate Research Assistant

*Münchmeyer Cosmology Group, Department of Computational & Theoretical Cosmology*

**Madison, WI**

*October 2024 - April 2025*

- Evaluates the performance and accuracy of Large Language Models (LLMs) in the field of research-level astrophysics
- Develops a Gradio web page displaying the problem set utilizing MathJax and expanding of the dataset by hundreds of problems

### Badger Consulting

*Analyst*

**Madison, WI**

*September 2024 - December 2024*

- Selected as one of 25 analysts from 150+ prospective applicants to join Badger Consulting as a freshman
- Provided Pro Bono consulting services to a craft based company in Upper East side Manhattan to increase revenue by 4x
- Performed 20+ hours of market research to develop an industry-competitive analysis leading to strategic client recommendations

*Project Manager*

*December 2024 - Present*

- Leads a group of 10 to offer tailored recommendations to a local sportswear company in Madison acting as a professional liaison
- Actively increases revenue to meet the clients combating industrial trends by diversifying store products

## PROJECTS

### NFL Prediction Model for the 2023-24 Season

*Model*

**Portland, OR**

*September 2023 - January 2024*

- Statistically tested accuracy of ESPN predictions (~52%) and documented results for the International Baccalaureate program
- Enhanced the model with additional factors such as quarterback performance and turnovers to beat ESPN's 52% figure by ~ 5%

### Glioma Signaling Research

*Website*

**Portland, OR**

*July 2023 - October 2024*

- Researched and authored a paper discussing the response of the immune system to Glioma, a specific brain or spine tumor
- Created a website to summarize the workings of Glioma signaling in the immune system for public reference

## LEADERSHIP AND INVOLVEMENT

### Proctor and Gamble Case Competition

*Competitor*

**Madison, WI**

*November 2024*

- Placed top 10 in the case competition, working with 4 teammates to propose a new product to solve a customer retention issue
- Utilized multiple research methods to learn how to propose new products and calculate the expected size of market

### Sunset Varsity Tennis

*Captain*

**Portland, OR**

*December 2022 - June 2024*

- Led practices, organized drills, and motivated 30 teammates to improve performance, leading to back to back podium placements
- Coordinated team logistics for matches, including transportation, player lineups, equipment and match schedules

*Individual Performance*

*September 2020 - June 2024*

- Qualified for State tournament each year placing as a semi-finalist and a bronze medalist contributing to the team success

### Sunset Cares

*President*

**Portland, OR**

*September 2022 - June 2024*

- Managed club over 60 members, raising money for foster children in the Portland Metro area, overseeing \$10,000 in funds
- Campaigned and ran the club's most successful fundraiser - a week-long door-to-door fundraising event, raising \$2000

## SKILLS

- Java, Python, C++, Bash, HTML, CSS, Pandas, PyTorch, Julia, OpenAI API, Interpersonal Communication, Analytical Thinking

## COURSES TAKEN

- Data Structures & Algorithms, C++, Java, Linear Algebra, Discrete Mathematics, Multivariable Calculus, General Physics

## INTERESTS

- Reading, Tennis, Indian Cultural Festivities, NFL, Portland Trail Blazers, Basketball, Swimming, Crosswords