

Kiarash Hesampour

Kiarashmpr@gmail.com | (818)390-3925 | Los Angeles, CA | Kiarash.dev/

SUMMARY

Computer Science graduate with a strong background in software development and embedded systems, experienced in applying engineering design to build practical, innovative solutions. Currently deepening my knowledge in AI and machine learning to stay at the forefront of emerging technologies. Passionate about combining expertise in systems, software engineering, and AI to create advanced, impactful technologies that can drive positive change and help improve everyday life.

EDUCATION

University of Southern California (USC) Master of Science, Computer Science	Los Angeles, CA Spring 2025 –
California State University Northridge (CSUN) Bachelor of Science, Computer Science	Northridge, CA Feb 2022 – May 2024
• Relevant Coursework: Machine Learning, Algorithm Design, Database Design, Software Engineering, Regular and Advanced web engineering, Data Structure, Embedded Applications, Human-computer interaction, Computer Architecture and Assembly, Computer organization, Operating System	
General Assembly Software Engineering Immersive Full-stack Software Engineering Certificate	Santa Monica, CA Oct 2019 – Jan 2020
Pierce College Associate Degree in Computer Science	Woodland Hills, CA Oct 2018 – Jan 2022

PROJECT EXPERIENCE

SAE Aeronautics Senior Design Project (Avionics) - CSUN	June 2023 - Present
<ul style="list-style-type: none">• Data and Target Acquisition: Utilized machine learning models for image processing and classification (YOLOv8)• GPS calculation of the Target based on the plane's coordinates, heading angle, pitch, and roll• Ground Station Implementation: Developed and maintained the ground station for live telemetry data and full control over the plane's components (flight controller, Companion Computer, Payload release) using the MAVLink protocol and pyMavlink Python library.• Primary Ground Station Controller: Led the operation and monitoring of the ground station during all flight tests and competition, ensuring optimal functionality and performance.	
- CSUNPosium Awarded for the best 10-minute presentation for Data and Target Acquisition for a RC Plane	
Software and Web Applications	Nov 2018 - Present
<ul style="list-style-type: none">• Developed a full-stack React application using MongoDB as the database and Cloudinary for image storage, with built-in functionality for user creation and password hashing to protect user credentials• Developed a full-stack application using Express and Node.js, integrating Google OAuth for secure user authentication and MongoDB for efficient data management.• Designed and implemented interactive web-based games and applications using HTML, CSS, and JavaScript, including a fully functional Minesweeper game.	

- Engineered a full-stack web application utilizing Angular (hosted on an AWS EC2 Linux instance), .NET (deployed on an AWS EC2 Windows Server), and Microsoft SQL (integrated via AWS RDS) for efficient cloud deployment and resource management.
- Developed a full-stack web application using Django, Python, and MySQL for back-end functionality and database management.

WORK EXPERIENCE

Operations Manager — Eksin Transportation Inc.

Woodland Hills, CA - December 2022 – Present

Manage dispatching and logistics, handle paperwork and compliance, and facilitate communication between clients, vendors, and drivers to ensure efficient operations for our interstate trucking company.

Freelance

Website Management and Design

Woodland Hills, CA

Feb 2020 - Present

Skills

Advanced Skills: Python | JavaScript | C++ | Java | HTML | CSS | React | Angular | Nodejs | jQuery | Express | tkinter | MAVLink | pyMavlink | Mission Planner | SQL | MongoDB | Visual Studio Code | Visual Studio | Git | GitHub

Intermediate Skills: AWS | Scikit learn | C | C# | TypeScript | NumPy | matplotlib | Panda | MIPS | ARM | .NET | Django | php | YOLO | Google Auth | Password Hashing | Microsoft 365 | Arduino IDE | Jupyter | Cloudinary | Linux | Nvidia Jetson

Soft Skills: Team Management | Teamwork | Problem Solving | Work Ethic | Adaptability | Leadership | Bilingual (English-Farsi)