Kevin Kim

(401) 651-9484 | kevink856@gmail.com | kevinkim.org | linkedin.com/in/kevink856

EDUCATION

University of California San Diego   Sep 2021 - June 2025
Bachelor of Science in Computer Science   *La Jolla, CA*
Coursework: Computer Security, Wireless Embedded Systems, Operating Systems, Parallel Computing, Algorithms
Extracurriculars: CSE Society (Board Member, Software Lead), ACM, Video Game Design, Varsity Esports
GPA: 3.70

EXPERIENCE

Arista Networks   June 2025 - Current
Software Engineer   *Santa Clara, CA*
- Incoming SWE @ Arista in June 2025

Falkor   July 2024 - Aug 2024
Software Engineering Intern   *San Diego, CA*
- Created recommendation system using cosine similarity in Django and numpy with 6000+ keyword parameters
- Migrated 10000+ LOC MVT site into React Native frontend and DRF API, cutting resource costs by 50%
- Implemented secure real-time chat rooms with Channels websockets using sanitized messages and rate limiting
- Built CI/CD pipeline with GitHub Actions and exposed each stack to domains with an nginx reverse proxy

TrustThink   Jan 2024 - June 2024
System and Security Engineering Intern   *San Diego, CA*
- Developed a FIPS 140-3 cryptographic API in C++ and OpenSSL that supports encryption, authentication, etc
- Utilized UART and TLS protocols to provide a security interface in C between an STM32 MCU and software
- Ensured 100% test code coverage for all libraries with GoogleTest for units and FuzzTest for memory checks
- Maintained a pen-test environment in Kali with clang-tidy, Valgrind and Binwalk for static and dynamic analysis

UCSD CSES   Aug 2023 - Dec 2023
Software Engineering Lead   *La Jolla, CA*
- Led a team of 5 developers and designers for the CSES WebDev website using React, Python and PostgreSQL
- Co-led a team of 5 developers in contributing to the open source Activist project weekly in Vue and Django
- Ensured security for AWS S3 and RDS services by configuring VPC subnets to internal dev and prod scopes

UC San Diego   Mar 2023 - Mar 2025
Instructional Assistant   *La Jolla, CA*
- Tutored for Computer Security (CSE 127) for topics of memory corruption, web attacks, encryption and networks

PROJECTS

Pathtracer | *C++, Embree, FreeImage, GLM*
- Developed a renderer with Embree that supports analytical lighting, ray/path tracing and photon mapping
- Used BVH heirarchy, kd-trees and multithreading for 99% optimization in computing approximated radiance

Lifesaver | *C#, Unity, Meta XR SDK*
- Engineered an MR app in a team of 4 for navigating sites with hazardous AQI via wayfinding and passthrough
- Ensured frictionless experience with voice recognition, hand tracking and symbolic input using Meta XR

EloEdge | *Python, pandas, R, Express, MongoDB*
- Created an API for a client to turn 13 years of 12000+ past and present college football games into Elo ratings
- Achieved 60% accuracy in predicting game outcomes using an error function with custom k-factor and modifiers

TECHNICAL SKILLS

Languages: C++, C, C#, Java, JavaScript, Typescript, Python, HTML/CSS, R, SQL, Haskell, MATLAB
Frameworks: Express, React, OpenSSL, OpenGL, GoogleTest, FuzzTest, Unity, Embree, Django, JavaFX, JUnit
Developer Tools: Git, Linux, AWS, Docker, CMake, LLVM, Valgrind, GDB, Binwalk, VirtualBox, Gradle, Postman