Eunyul (Estelle) Kim estellekimdev.com | (714) 719-5688 | kestelle@sas.upenn.edu

University of Pennsylvania — BSE Digital Media Design (Computer Science & Graphics), c/o 2027 GPA: 3.5 / 4.0

• Coursework: Algorithms & Data Structures, Advanced Computer Graphics, Computer Systems, Linear Algebra

WORK EXPERIENCE

Data Engineering Intern @ Southern California Edison

2025

- Designed and optimized **ETL pipelines** serving a utility with 15M residents.
- Independently learned SQL in under 2 days, collaborated with stakeholders to deliver 10+ engineering solutions.

Frontend Web Developer @ Children's Hospital of Philadelphia Center for Autism Research

2025~

- Developing **ML-driven** research management hub for autism studies using **React**, **TypeScript**, and **REST API**s.
- Implemented scalable data visualization & state management components to streamline researcher workflow.

Undergraduate Business Development & Marketing Intern @ FlexIt Inc.

2024

- Drafted **Q4 stakeholder report** and investor communications for a late-stage startup.
- Identified potential partners through research, created detailed partnership strategies, and facilitated meetings.
- Proposed and implemented **UI features** and **marketing graphics** such as a new search bar and promotional cards.

ACTIVITIES

Vice President External, 2x Project Lead, Full-Stack Developer @ Penn Spark

2024~

- Manage corporate relationships and partnerships for Penn's largest community of creative technologists and designers.
- Led 2 full-stack product teams; scoped features, shipped apps to hundreds / thousands of users.

Industrials Committee @ Wharton Investment & Trading Group

2024~

• Applied **financial modeling**, **competitive analysis**, and pitched in intercollegiate competitions.

Board Member @ UPenn Women in Computer Science Residential Program

2024

• Founded faculty speaker series; organized technical workshops.

Governmental Affairs Director @ California Association of Student Councils

2024

• Authored & passed **3 California laws** through direct legislative collaboration.

PROJECTS

OpenGL Mini Minecraft — C++, OpenGL, GLSL

2024

- Engineered voxel game engine with custom rendering pipeline.
- Built VBO-based terrain system, procedural sky shaders, and real-time water waves & reflections.

Internet Atlas — React Three Fiber, ML, FastAPI, Supabase

2025

- Led development as Technical PM for a 3D graph visualization platform exploring large-scale browsing data.
- Built an **interactive 3D force-directed graph** with custom camera movements for node and edge selection.
- Engineered animated SVG overlays and zoom/pan controls for intuitive graph interaction.
- Integrated vector embeddings, semantic search, and real-time ML APIs into a dynamic 700-node dataset.

Into the Blue: Virtual Museum Experience — React, Node.js

2024

- Developed **browser-based storage** and **scalable camera-to-sticker pipeline** for museum exhibition experience.
- Maintain production deployment for 9+ months for **180k visitors** with consistent performance.

SKILLS/ACHIEVEMENTS

Languages: Python, C++, Java, TypeScript, JavaScript, SQL, GLSL, OCaml, C

Frameworks: React, Vue.is, Next.is, React Native, Node.is, Django, Firebase, Supabase, OpenGL, WebGL

Concepts: Algorithms & Data Structures, Rendering Pipelines, Full-stack Web Development, Full-stack App

Development, Machine Learning, Data Pipelines, User Interface Development

Tools: Figma, Adobe Creative Suite, Maya, Docker

Achievements: 3× AIME qualifier (top 2.5% of test-takers); Korean TOPIK II Level 6 (highest).