

Jiedi Mo

Gameplay Engineer | C++ / C# | Unreal Engine 5 / Unity

University of Southern California | (925)-336-5190 | jiedimo@usc.edu | jiedimo.net | [LinkedIn](#) | U.S. Citizen

EDUCATION

University of Southern California — MS in Computer Science-Game Development Aug.2026-Present
University of Utah — BS Computer Science, Game Development Emphasis | **GPA:** 3.62/4.0 (Dean's List) 2021-2026
Relevant Coursework: 3D Graphics and Rendering, Design for interactive Media, Game Design, Analysis of Algorithms, Data Structures, Software Practices, Capstone Game Projects.

TECHNICAL SKILLS

Languages: C++, C#, Python, Java, JavaScript, Kotlin, SQL
Game Engines: Unreal Engine 5 (C++, Blueprints), Unity, GameMaker Studio
Gameplay Programming: Gameplay Systems, Combat Systems, Enemy AI, Behavior Trees, Player Controllers, Procedural Generation, UI/HUD Integration.
Tools & Technologies: Git, Visual Studio, Niagara VFX, Box2D, Qt etc.

EXPERIENCE

AI Research & Software Engineering Intern | SmartSens Technology | Shanghai, China Summer 2026
• Developed Python automation tools for text-to-video generation and batch processing workflows.
• Benchmarked AI video models and optimized evaluation infrastructure using VBench.
Robotics & AI Research Intern | Shenzhen Meta Chip Technology Co. Ltd. | Shenzhen, China Summer 2025
• Built robotics navigation features using C++/Python and 3D Gaussian Splatting for environmental reconstruction.
• Programmed a HiWonder JetAuto Rover to interface with AI models and 3DGS.
AI Model Development Intern | SmartSens Technology | Shanghai, China Summer 2023
• Trained Stable Diffusion, ControlNet and BLIP-2 models and created dataset of 50,000+ images.
• Developed a CLI tool for background replacement using Stable Diffusion and segmentation.

SELECTED GAME PROJECTS

Cradle of the Rift | **General Engineer & Gameplay Programmer** | **Unity, C#** | **Team of 16** Aug 2025-Apr 2026
• Built player interactions and procedural chest spawning with distance-based placement constraints.
• Developed enemy and boss AI with distance-based combat logic, multiple attack states, and boss variants.
• Created combat VFX and balanced player/enemy stats, aggression, and item effectiveness.
Fallen Crown | **Lead Gameplay System Engineer** | **Unreal Engine 5, C++** | **Team of 5** Aug-Dec 2024
• Implemented third-person combat systems, player controllers, hit/damage interactions, and enemy AI behaviors.
• Built complete UI/HUD systems and integrated Niagara VFX and gameplay-driven audio into the player experience.
Educational Military Tactics Application | **Programmer & UI Designer** | **C++, Qt, Box2D** | **Team of 6** Aug-Dec 2023
• Designed interactive quiz systems and Box2D-powered troop simulations with score tracking and progression logic.
• Collaborated across subgroups to integrate gameplay, UI, and simulation code.

ADDITIONAL PROJECTS

Grading Web Application | **Software Developer** | **Django, HTML/CSS, SQLite, AWS** | **Solo Project** Jan-May 2025
• Designed a relational database and role-based dashboards for teachers and students.
• Built a responsive frontend with Django templates, CSS, and jQuery; deployed on AWS EC2 with NGINX and HTTPS.