

Yuan Jiang

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EDUCATION

Washington University in St. Louis	MS Computer Science & BS Computer Science	St. Louis, MO May 2025
DePauw University	BS Computer Science (conferred May 2024)	Greencastle, IN May 2022

TECHNICAL SKILLS

- **Frontend & Backend:** HTML, CSS, JavaScript, React, Java, Python, C++, SQL, C#, swift.
- **Databases:** MySQL, SQLite, MongoDB. **APIs:** RESTful APIs, GraphQL. **Version Control:** Git, GitHub.
- **Collaboration & Leadership:** Team leadership, Agile methodologies, project management.
- **Relative courses:** iOS Development (TA), web development (TA), Deep Reinforcement Learning, Data structure, Analysis of Algorithms, Video Game Programming, Object-oriented software development laboratory, Data mining

EXPERIENCE

Washington University in St. Louis	IT Technical Support Engineer & Consultant	St. Louis, MO Jan. 2023 - Present
<ul style="list-style-type: none">● Responsible for the maintenance and management of the computer equipment and network system, including routine inspection and update.● Participate in cross-departmental collaborative projects of the IT team, such as campus network upgrade and information security improvement, provide technical support and solutions for the school, and promote the development of campus science and technology.		

Ningbo Zhongzhou Star Information Technology Co.,LTD,	Intern of Software Developer (C++)	Remote, China May. 2024-Sept. 2024
<ul style="list-style-type: none">● Collaborated with cross-functional teams to design, implement, and test new features.● Assisted in the full software development lifecycle, including requirements gathering, design, coding, testing, and deployment.		

Ningbo Zhongzhou Star Information Technology Co.,LTD,	Intern of Software Developer (C++)	Ningbo, China Jun. 2020-Sept. 2020
<ul style="list-style-type: none">● Developed integrated management systems for Enterprise Resource Planning (ERP), Product Data Management (PDM), Manufacturing Execution Systems (MES), and Supply Chain Management using C++. Responsible for coding and optimizing code, utilizing Object-Oriented Programming (OOP) and data structure algorithms to ensure code maintainability and performance optimization.		

PROJECT

Voice Diary App	St. Louis, MO Sept. 2023 - Dec. 2023
<ul style="list-style-type: none">● A self-developed diary iOS app that allows users to record voice memos and convert them into text for daily note-taking and schedule organization which is also already released on Apple Store.● Implemented the voice-to-text conversion feature using Swift and the AVFoundation framework. Implemented multi-language support and completed localization tasks in Xcode to enhance the user experience.	

WashU Makerspace Staff Limited Website	St. Louis, MO Aug. 2024 - Present
<ul style="list-style-type: none">● Developed a school portal integrated with a single sign-on (SSO) system for Washington University in St. Louis MakerSpace.● Responsible for both front-end, back-end development, using HTML/React to create a user-friendly interface and create a database by MySQL.	

Independent Website for Pet Supply Store	Remote, China May. 2024 - Sept.2024
<ul style="list-style-type: none">● Developed a fully functional e-commerce website for a pet supply store by HTML/CSS/JavaScript.	

File System Emulator Project (C++)(OOP)	St. Louis, MO Jan. 2023 - Jun. 2023
<ul style="list-style-type: none">● Design and implement a simulated file system with over 5500 lines of C++ code, implement a file operating system based on command line interaction, write a variety of commands (such as creating files, copying files, password protection files) to manipulate the file system.● Common design patterns such as interface inheritance, abstract factory pattern, visitor pattern, agent pattern and command pattern are applied to improve the extensibility and flexibility of code.	

Tic-Tac-Toe and Gomoku Game (C++)	St. Louis, MO Jan. 2023 - Jun. 2023
<ul style="list-style-type: none">● Developed over 800 lines of C++ code to implement object-oriented game logic by refactoring a Tic-Tac-Toe game into a base class, utilizing inheritance and polymorphism.● Implemented a Gomoku game with a 19x19 board, supporting customizable board sizes and winning conditions. Created and tested unit tests for both games to ensure robust performance and accuracy.	

AI-Powered Pacman and Gridworld Simulation	St. Louis, MO Jan. 2024 - Jun. 2024
<ul style="list-style-type: none">● Developed intelligent agents using AI techniques like DFS, BFS, UCS, A* search, Minimax, Alpha-Beta Pruning, Expectimax, and Q-learning. Designed heuristics to optimize pathfinding in Pacman and Gridworld simulations.● Created multi-agent systems to solve complex decision-making problems in adversarial and reinforcement learning environments.	

Reverse Engineering and Malware Analysis	St. Louis, MO Jan. 2024 - Jun. 2024
<ul style="list-style-type: none">● Develop advanced skills in reverse engineering and malware analysis using tools such as IDA, GDB, and Immunity Debugger.● Analyze malware behavior through assembly language, API calls, and file formats (PE, ELF). Invert the Java bytecode and perform assembly level debugging to check for malicious payloads. Basic and advanced static and dynamic analysis of Windows and Linux malware samples.	

Java MongoDB Implementation	St. Louis, MO Jan. 2024 - Jun. 2024
<ul style="list-style-type: none">● Implemented MongoDB-like functionality in Java, including database and collection management, document handling, and query execution.● Designed operations for inserting, updating, deleting, and querying documents, supporting complex queries with embedded documents and arrays. Utilized the Gson library for JSON parsing and manipulation.	