# Chen Guan Xuan





### **To Brief self-introduction**

I am a graduate student currently studying at National Tsing Hua University Department of Computer Science. I have finished my compulsory service in the Army of the Republic of China (Taiwan) and currently looking for a software engineering job. I have accumulated a basic knowledge of computer science through courses, projects and internship during my undergraduate and graduate studies. The area that I interested in computer science is developing efficient software system and integrating machine learning to help overcoming any specific problems that exists in our real life.

## **Education**

**National Tsing Hua University** 

M.S. Computer Science

**National Chung Hsing University** 

B.S Computer Science

September 2023 - July 2025

Hsinchu, Taiwan

September 2018 – July 2022

July 2024 - September 2024

Taichung, Taiwan

Hsinchu, Taiwan

# Work Experience

**Silicon Motion** 

Firmware Engineer Intern

- Develop and maintain FTL simulator script builder
- > Learning UFS protocol
- ➤ Assist to create PTL error handling scripts

**ASML** July 2022 - September 2022 Tainan, Taiwan

- Software Engineer Intern
- Assist software automation group develop BDD(Behavior-Driven Development) environment

> Using python to write testing and automation program helping RD to find Software bug

- ➤ Learn skills like Sourcetree(git), Testcomplete, VDI, Python

# **Research Experience**

### **Software Engineering Laboratory**

lab member

September 2023 – July 2025 Hsinchu, Taiwan

- ➤ Department of Computer Science, National Tsing Hua University
- > Research topics such as software testing, code clone detection, commit message generation
- > Set up and maintain the laboratory's deep learning server

# **Publications**

### Applying Structured Code Diff Representation and Sequential Hybrid Retrieval to **Enhance LLM-Based Commit Message Generation**

2025

- ➤ Taiwan Conference on Software Engineering (TCSE 2025)
- > Conference website: https://tcse2025.seat.org.tw/

# Other Experience

#### **National Tsing Hua University**

Teaching Assistant

January 2024 – July 2024 Hsinchu, Taiwan

- > software engineering courses at National Tsing Hua University Department of Computer Science in 2024.
- > Main task is designing assignments and assisting professors.
- ➤ Learn skills like Turnitin, Unit testing, Integration testing, CI/CD, Scrum

# **A** Projects

#### gitbro

- ▶ gitbro is a powerful AI-assisted Git CLI tool that enhances developer productivity by automating commit workflows, summarizing diffs, generating branch names, validating messages, and much more.
- > It supports multiple AI providers including OpenAI, Google Gemini, Anthropic Claude, and locally-hosted Ollama models, allowing both cloud and offline usage. The tool offers an easy-to-use CLI with interactive features, semantic commit support, and built-in pre-commit hook integration for teams.
- https://github.com/jemmy9211/gitbro

#### WeatherVue

- ➤ WeatherVue is a web application that integrates with the public API provided by the Central Weather Bureau of the Republic of China (Taiwan). Utilizing the data offered by this API, the application employs advanced visualization techniques to enhance the accessibility of complex weather data for users. The project leverages Vue, Bootstrap, and Leaflet technologies, facilitating the rapid and practical development of the web interface.
- > Project Link: https://jemmy9211.github.io/WeatherVue/

# **# Course**

Relevant Courses from September 2018 to July 2024

- \* Algorithm (A)
- \* Advanced Compiler (A)
- \* Computer Organization (A)
- \* Formal Language (A-)
- \* Computer Programming (A+)
- \* Object-oriented Programming (A+)
- \* Digital Image Processing (A)
- \* Software Reliability and Testing (A+)
- \* Linux Kernel (A+)
- \* Data Science (A)
- \* Parallel Programming (A-)

# **╬ Club**

NCHU Tennis Team Tfics Programming Club

# Skills

**Programming Language** C/C++, Python, JavaScript

Framework Vue, Django, Flask

**Sport** Tennis, Swimming

**Talents** Violin