RYOZO MASUKAWA

☑ rmasukaw@uci.edu in ryozo-masukawa 🗘 RyozoMasukawa 🕈 https://ryozomasukawa.github.io/

Education

University of California, Irvine

Master of Science in Computer Science

September 2023 – **June 2025** *GPA: N/A*

Meiji University, Tokyo

Bachelor of Science in Computer Science

April 2018 – March 2023

GPA: 3.86/4

 ${\bf Advisor}: {\bf Tomohiro} \ {\bf Takagi} \ {\bf at} \ {\bf Web} \ {\bf Science} \ {\bf Laboratory} \ ({\bf WSL})$

University of California, Berkeley Summer Sessions

June 2019 – August 2019

GPA: 4.0/4

Award

Academic Excellence Award at Meiji University

March 26, 2023

Awarded for a student who ranked 1st out of undergraduate class

Technical Skills

 $\textbf{Languages/Database}: \ Python \ (proficient), \ C \ (proficient), \ C++(proficient), \ Java(prior \ experience), \ Kotlin(prior \ experience), \ C++(proficient), \ C++(proficient),$

experience), Verilog HDL (prior experience), SQL (prior experience), JavaScript (prior experience)

Web Technologies: Django, Django REST Framework, React.js, Railway, firebase

Software & Tools: Docker, Microsoft Office, GitHub, TEX

Projects

Full-time Research with airCloset at WSL | Pytorch, GAN, CLIP, VL models Git

April 2022 – March 2023

- Served as a project leader of a 5 person team
- Developed deep learning models for clothing design generation according to the fashion trend
- Implemented the entire architecture of trend forecasting module and GAN-based generative model
- Automated the order process and reduced the workload of fashion item buyers by 50%
- Published 2 papers

Part-time Research with LAC at WSL | Pytorch, NLP, Transformer, huggingface Git

Sept 2022 – August 2023

- Surveyed GAN-based time-series tabular data generation for financial fraud detection
- Implemented GPT-based table data generation model
- Implemented Transformer-based System Log summarization Model inspired by Unilog and chatGPT API

 $\textbf{Team web app development} \mid \textit{Django REST framework \& React Git(team) link(frontend)} \qquad \qquad \textbf{April 2}$

April 2023 - July 2023

- Developed a restaurant recommendation web app using chatGPT API with Web Science Laboratory members
- Set up an uniform development environment using Docker
- Deployed the app using railway and firebase
- Implemented both basic frontend and backend source codes

Android App Development for Ningyocho Shopping Board Event | Kotlin, realm Git April 2020 - July 2023

- Developed and still maintaining an Android application to support annual event in Ningyocho Town
- Automated sales calculation by using database and created a simple game as a substitute of the event
- Halved the time for calculating total sales from the past

Publications

Sayaka Aoba, Yugen Sato, **Ryozo Masukawa**, Shosuke Haji, Makoto Sato, Taiga Matsui, Keita Ishikawa, Tomohiro Takagi **Comment generation using a large language model for fashion item recommendation**, Preprint to MMAsia 2023 | *link*

Ryozo Masukawa, Sayaka Aoba, Yugen Sato, Shosuke Haji, Makoto Sato, Taiga Matsui, Keita Ishikawa, Tomohiro Takagi Trend Analysis-Based Fashion Image Generation, JSAI 2023 | link

Ryozo Masukawa, Shosuke Haji, Tomohiro Takagi, Taiga Matsui, Keita Ishikawa, Masane Fuchi, Kazuki Yamaji, GAN-based Detailed Clothing Generation System, The 17th International Conference on Knowledge, Information and Creativity Support Systems (KICSS 2022) | link

Extracurricular works and Internships

Cross Cat Data Scientist Team Hackathon

August 2023

Tokyo

Intern

- Analyzed company's attendance data and proposed a novel functionality of management system using Python and statistical hypothesis testing (t-test, chi-squared)
- Awarded 1st prize
- Collaborated with a team of three data scientists

Integrated Quality(IQ), a Computer Programming Club

Sept 2019 - March 2023

Accountant officer

Tokyo

- Taught underclassmen basic concepts of Computer Science in C language
- Served as accountant officer in final year

Meiji University Study Abroad Advisor

April 2021 - August 2022

Tokyo

- Supported underclassmen willing to study abroad
- Served as a **president** of all advisors in 2022

Nomura Research Institute(NRI) Internship

August 2021

Intern

President

Tokyo

• Designed an architecture of an automated secure access log transmission system to the client companies for governmental scrutiny

Japan Tata Consultancy Services Internship

Sept 2021

Intern

Tokyo

- Developed a Support Vector Machine based machine learning model for subway passenger population prediction
- · Awarded 1st prize in terms of the model's accuracy

SmartTrade Internship

February 2020 - April 2020

Intern

Tokyo

- Worked in a project to develop stock price forecasting algorithm using machine learning
- Aborted Due to the COVID-19 Pandemic