

Anthony (JunXiang Huang)

LinkedIn, GitHub, +86 (185) 185-46046

Email: anthonyhuang1909@gmail.com

Skills

- **Programming Languages:** Python, C/C++, SQL, R, Java, HTML, CSS, Matlab.
- **Programming Frameworks:** PyTorch, OpenCV, Huggingface, Pandas, NumPy, Matplotlib, Seaborn, Neo4j, Flask.
- **Technologies:** Deep Learning, Computer Vision, Weights and Biases, Docker, Git, GCP, Linux, Kafka, DVC
- **Languages:** English (Native), Chinese (Full Professional Proficiency), Indonesia (Native).

Experience

- **Zhejiang University** Hangzhou, China
Student Researcher – Computer-Aided Design Lab (Prof. Changqing Zou) 09/2024 – Present
 - **Literature Review:** Review 20+ papers on Super-Resolution and Generative-Vision Models.
 - **Modeling:** Developed a **Transformer-based super-resolution model with Dual Attention**, optimized for 2× faster inference via pruning. Leveraged 8 V100 GPUs for distributed training, ensuring high performance and scalability.
- **Nanjing University** Nanjing, China
Student Researcher – Graduation Thesis (Prof. Wei Hu) 04/2022 – 09/2023
 - **Knowledge Graph Engineering:** Designed and implemented a **Neo4j**-based knowledge graph for managing Maven dependencies, using **SAT solving and DFS** to automate pom.xml generation and resolve conflicts.
 - **Model Optimization:** Enhanced Maven build efficiency through graph-driven dependency resolution, improving success from 70% to 98% and streamlining the compilation process.
- **Meituan** Beijing, China
Software Engineering Internship 10/2023 – 11/2023
 - **Backend Development:** Built a **Flask Python** backend with **LLM** to analyze food delivery data and provide operational insights, improving decision-making and efficiency.
- **Alibaba Group** Hangzhou, China
Software Engineering Internship - Intelligent Connectivity 07/2023 – 09/2023
 - **Big Data Processing:** Managed large-scale datasets, developed automated data cleaning and validation tools with Python, and SQL, optimizing preprocessing pipelines for improved model performance.
 - **Prompt Engineering & Model Optimization:** Designed prompts for generative AI models, refined structures through failure case analysis, and collaborated on data flow improvements to enhance model efficiency.
- **JP Morgan Chase & Co.** Remote
Software Engineering Internship 07/2020 – 09/2020
 - **Data Integration & Optimization:** Streamlined real-time stock price processing, optimized Python server for continuous updates, and integrated live visualizations in React using Perspective.js. Developed price alerts and dashboards, ensuring efficiency through testing.

Projects

- **SCAttNet:** Developed an image super-resolution model with spatial and channel attention mechanisms, achieving a PSNR of 29.18 and SSIM of 0.77 for high-quality image enhancement in mobile, medical, and digital art applications.
- **Dynamic Pricing:** Built a real-time pricing model using CatBoost, achieving an RMSE of 186.07 and an R² of 0.9008. Integrated into a Docker-based CI/CD pipeline, optimizing deployment for data-driven pricing in e-commerce.
- **BoW + Tiny Image Scene Recognition:** Built a scene recognition model using Bag of Words and Tiny Image Representation with KNN, improving accuracy by 17.8%. Enhanced features with SIFT and k-means clustering.

Education

- **Nanjing University** Nanjing, China
BSc Computer Science 09/2020 – 07/2024
 - Thesis: A preliminary study on the construction and application of knowledge graph for Java code repositories
 - Relevant Courses: Software Development, Machine Learning & AI, Deep Learning, Algorithms, Cloud Computing, Database & Big Data, System Design, MLOps.