

Basic Information

- Male 22 years old Han ethnicity member of Communist Party of China IEEE Student Member
- **GPA:** 3.74/4.0 **Email:** wenjieshu2003@gmail.com

Research Experience and Achievements

- **CMT: Cross Modulation Transformer with Hybrid Loss for Pansharpening** GRSL
- **DDA: A dual-domain attention plug-and-play prior for pansharpening** 2024 ICLR tiny
- **Exploring the Low-Pass Filtering Behavior in Image Super-Resolution** 2024 ICML
- **Videogen-of-thought: A collaborative framework for multi-shot video generation** 2026 NIPS/W
- **LightGen: Efficient Image Generation through Knowledge Distillation and DPO** under review
- **Temporal Regularization Makes Your Video Generator Stronger** under review
- **Go with Your Gut: Scaling Confidence for Autoregressive Image Generation** under review
- **Enhancing Diffusion-based Restoration Models via Difficulty-Adaptive Reinforcement Learning with IQA Reward** under review
- **AlignVid: Training-Free Attention Scaling for Semantic Fidelity in Text-Guided Image-to-Video Generation** under review
- **ThinkVid: Benchmarking Visual Reasoning in Video Generative Models** under review
- **CoRe-GRPO: Consensus-driven and Region-focused RL for Human-Centric Generation in Lightweight Diffusion Models** under review
- **Researcher, Evelyn AI** 2025.06 - now
Conducted research under the supervision of Professor Sernam Lim, image/video generation, especially reinforcement learning, long video generation and world model benchmark.
- **Visiting Student, HKUST, Generative AI** 2024.09 - 2025.6
Conducted research under the supervision of Professor Harry Yang, investigating video generation/editing applications.
- **Researcher, CUHK SZ, Video Generation** 2024.06 - 2024.08
Under the supervision of Professor Qiang Sun and Benyou Wang, participated in a video generation engineering project focused on enhancing video resolution and quality. Developed the data pipeline to efficiently process and feed training data into the model and implemented the super-resolution component of the model architecture to upscale low-resolution video frames.
- **Research Assistant, UESTC, Pansharpening** 2022.06 - 2024.04
Under the guidance of Distinguished Researcher Liangjian Deng, conducted research in remote sensing image fusion, super-resolution, and hyperspectral compression snapshot imaging. Research topics include: integrating modulation techniques from signal processing into attention mechanisms to effectively coordinate the advantages of panchromatic and multispectral images for pansharpening, while proposing a hybrid loss function combining wavelet and Fourier transforms to further enhance image fusion quality (CMT, first author); designed a new plug-and-play module that combines convolution and attention mechanisms to effectively improve performance metrics in image fusion tasks (DDA, first author).

Project Experience

- **China International College Students' Innovation Competition** 2023.04 - 2023.12
Core member of the Xin Cheng Rui Pin project, leading market research and presentation preparation. Awarded a national silver award for innovation in frequency synthesis chip technology.
- **Sound Source Localization and Tracking System** 2022.06 - 2022.08

As a core member, utilized stm32F407 and microphone sensors with the generalized cross-correlation algorithm to complete the design of a sound source localization and tracking system.

Honors and Awards

Second Prize Scholarship for Academic Achievement (2021-2022), Model Scholarship (2022-2023), Provincial Second Prize in National College Students' Internet of Things Competition (2023), National Third Prize in National College Students' Optoelectronic Design Competition (2023)

Student Activities

Member of the Bee's Home Teaching Team (2021-2022), Excellent Group Leader of the "Xin Tong Innovationbc Center" (2022-2023), Council Member of the Applied Electronic Association (2022-2023)

Skills and Languages

Frameworks Pytorch, LaTeX

Languages CET-4: 576 CET-6: 480

Programming Python, C/C++, Matlab, Verilog, FBD, Halcon

Hardware Schematic Design, High-speed PCB Design, SolidWorks