

# András Gotts

19 The Old Village, Huntington, York • andras.gotts@outlook.com • 07434696669

**Portfolio:** <https://andrasgotts.github.io/andrasgotts.io/>

## Profile

Recent Software Engineering graduate with a good foundation in software design, development and testing. Skilled in communication, teamwork, and problem-solving. Experience in delivering projects from concept to implementation through university coursework and group collaborations. Adaptable, innovative, and committed to continuous learning, with the ability to apply critical thinking and creativity to real-world software challenges.

## Education

***BSc (Hons) in Software Engineering University of Chester***

innovation Project: **Generating art using diffusion and GANs based on artwork found in a museum**

### **Huntington Secondary School**

York, England

**A-levels** (covid year of cancelled exams): Maths: C, computer science: C, geography: A

GCSE: Maths:7, Computer Science: 6, English: 5, German: 6

## Technical Skills

- **Programming & Software Development:** Proficient in Python and C++, with practical experience applying SOLID and OOP principles. Built AI models (GAN, DCGAN, CycleGAN, DDPM) using PyTorch, showcasing rapid self-learning and adaptability. Developed custom interfaces in QT6 to deliver user-friendly AI tools.
- **Web Development:** Designed and deployed responsive applications using HTML, CSS, JavaScript, Bootstrap, Razor Pages, React, Flask, and Pixijs. Delivered projects with a focus on performance optimization, accessibility, and maintainability.
- **Data & Database Management:** Skilled in SQL, R, and Pandas for data querying, cleaning, and analysis. Experienced with SQL Server Management Studio (SSMS) for database administration and performance tuning.
- **Testing & Version Control:** Implemented unit and automated testing frameworks to ensure software reliability. Experienced in Git for collaborative development, branching strategies, and version tracking.
- **Agile Development Practices:** Worked with SDLC, Scrum, and Agile methodologies to manage complex projects, ensuring timely delivery while maintaining quality standards.

- **Systems & Infrastructure:** Experienced with Linux (Ubuntu) and Windows. Built and configured personal dual-boot development environment to support AI model training and experimentation.

## **Innovation & Research Projects:**

- Developed a university research project on **AI image generation** using GANs and diffusion models. Overcame hardware constraints by researching and implementing CycleGAN, adapting project scope to achieve viable results.
- Integrated pre-trained models from HuggingFace, demonstrating resourcefulness in leveraging state-of-the-art AI for constrained environments.
- Balanced multiple academic projects through effective time management and prioritization, consistently delivering to a high standard.

## **Other Projects and Group Activities**

### **Banking Application Testing (C++)**

- Collaborated in a group project to design and implement comprehensive unit tests for different components of a banking system, ensuring reliability and correctness of core functionality.

### **Game Development: SDL2 Platformer & Console Blackjack (C++)**

- Developed a 2D game using SDL2 and a console-based Blackjack game. Conducted extensive independent research to master the SDL2 library, implemented game mechanics, and ensured accurate rule-based logic for Blackjack.

### **Data Warehouse Design & ETL (Python, Pandas, SQL, SSMS)**

- Designed and implemented a data warehouse from multiple datasets. Preprocessed and transformed data using Pandas in Python before integrating it into SQL Server (SSMS). Gained experience in data modelling, and database management.

### **Restaurant Website (ASP.NET Razor Pages, SQL)**

- Built a dynamic website with database integration to manage menu items and administrator access.

## **Additional skills Gained Through In-House University Work Experience**

### **Educational Breakout Game Project**

- As a group coordinated with a client through bi-weekly meetings, developing strong stakeholder communication skills and ensuring alignment on key project decisions.
- Collaborated using GitLab for version control and team-based development, contributing to different components of the project.

- Designed and implemented interactive mini-games by learning and applying the JavaScript 2D rendering engine **PixiJS**, demonstrating adaptability and rapid acquisition of new technical skills.
- Integrated games seamlessly into the broader website, requiring effective teamwork, clear communication, and synchronization of update cycles.
- Developed problem-solving and project management skills by adjusting timelines to accommodate challenges while maintaining smooth performance and overall project quality.

## **Interests**

- Coding
- Computer gaming (Baldur's Gate 3)
- Travelling
- Tinkering with hardware
- Football

**References available on request**