

Yael Lyshkow

Location: Toronto, ON
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Experience

DesAcc NA Inc. — Data Processing & UI/ UX Intern

MAY 2023 - SEP 2023

- Transformed diagnosis text files into structured JSON, optimising data manipulation and storage
- Developed a user-friendly UI in Python for healthcare professionals to identify and label conditions in over half a million diagnosis documents
- Created a large, classified dataset to train AI models for extracting and labelling diagnoses from unstructured text
- Maintained data accuracy, contributing to the successful deployment of AI tools in clinical settings
- Handled and processed sensitive health data with strict adherence to HIPAA regulations, guaranteeing data protection and confidentiality throughout the project

DesAcc NA Inc. — Software Intern

MAY 2024 - SEP 2024

- Developed a pipeline to convert sequences of 2D Cartesian images into 3D DICOM files for enhanced medical imaging applications in Python
- Implemented algorithms for accurate spatial alignment and volumetric reconstruction, ensuring high fidelity in the resulting 3D models
- Continuously optimised the process to handle large datasets efficiently while sustaining data integrity and compliance with medical imaging standards
- Worked with DICOM viewers such as Weasis, 3D Slicer, and OsiriX to validate and visualise the generated 3D DICOM files

Projects

COVID Image Conversion

- Used Machine Learning for Rapid Identification of COVID Sequence Sub-Type from Genomics Data transformed into images with over 95% accuracy

Tier List Creator

- Developed the UI and integrated an application for creating tier lists, focusing on adhering to the SOLID principles and Clean Architectures.
- Utilised the ChatGPT API to allow for personalisation

Tetris

- Created a Tetris game in MIPS Assembly, implementing features like gravity and music while adapting to the complexities of the Assembly language

Education

University of Toronto

HONOURS BACHELOR OF SCIENCE
SEP 2022 - PRESENT

- Computer Science (Specialist)
- Mathematics and Classical Civilization (Minors)
- Current CGPA 3.91

Skills

Technical

- Python, Java, C, HTML, CSS, JavaScript, NodeJS, React, RestAPI
- GIT, LaTeX, Microsoft Office Suite
- DICOM, JSON, XML, FASTA
- Data structures, multivariable calculus, software development in teams

Analytical

- Data manipulation, volumetric reconstruction, AI model training

Awards & Certifications

- University Of Toronto International Scholar Award (\$100k)
- Woodsworth College Academic Scholarship Second Year (\$500)
- HIPAA Security Training
- HIPAA Awareness Training
- Cyber Security Awareness (Virtual College)
- The Essentials of Data Protection (Virtual College)
- Confidentiality in the Workplace (Virtual College)