

Het Patel

☎ 647-291-6312 | [in linkedin.com/in/hetp04](https://www.linkedin.com/in/hetp04) | 🌐 patelhet.ca | ✉ hetpate384@gmail.com | 🏠 github.com/Hetp04 | 📍 Toronto, ON

EDUCATION

Western University

(BSc.) Honors specialization in Computer Science

Expected 2026

London, ON

- Cumulative GPA: 3.9/4.0; Dean's List
- Relevant Coursework: Software Engineering, Artificial Intelligence, Data Structures Algorithms, Operating Systems

EXPERIENCE

LLM'S Research Assistant

May 2024 – Present

Western University | Human Centered Computing Group

London, ON

- Developed a Chrome extension for NLP annotation to improve text classification, sentiment analysis, and entity recognition, significantly reducing manual annotation effort.
- Increased sentiment analysis accuracy by **12%** by fine-tuning a large language model (LLM) on a specialized dataset of **85,000 entries**, using the annotation system.
- Enhanced the annotation tool by integrating capabilities for annotating text, audio, and video to support detailed analysis of multi-format interactions.

Fullstack Software Developer

Oct 2024 – Present

Western University | Tech For Social Impact Club

London, ON

- Developing a certification-based learning platform that enables users to complete courses, earn certifications, and manage their skills through an intuitive interface.
- Aided in backend development by setting up server.js, authentication, Postgres database, and API endpoints, along with implementing features to manage certifications and skills.
- Designing and developing frontend components, including responsive login/signup pages, dynamic profile displays, and intuitive navigation to enhance user experience.

Undergraduate Research Assistant

Feb 2024 – Apr 2024

Western University | Human Centered Computing Group

London, ON

- Authored an academic paper focused on leveraging LLMs to identify and mitigate phishing email threats; presented at the **HSI 24 international conference** showcasing results from analyzing over **4,000 fraudulent emails**.
- Enhanced data interpretability through statistical analysis and data visualization techniques, including linear regression and k-means clustering.
- Conducted performance analysis on 15 AI models by calculating metrics such as mean, standard deviation, and percentile distributions, identifying ChatGPT 3.5 as the top performer with a detection accuracy of **98%**.

PROJECTS

Memeify | Python, React, Flask, SQLite, groq API, Imgflip API

July 2024 – June 2024

- Developed an AI-powered platform that gamifies studying by transforming traditional flashcards into engaging learning tools with **95% content relevance** through meme integration and a custom matching algorithm.
- Integrated Imgflip API for dynamic meme generation, allowing users to create contextually relevant and visually appealing memes based on their flashcards and study questions.
- Added personalization by refining meme suggestions based on user feedback to better match study preferences.

Notification System | React, MongoDB, Node.js, Socket.IO, Electron.js

Aug 2024 – Aug 2024

- Developed a PC application using Electron.js and Node.js to manage and block excessive notifications from selected messaging apps, minimizing notification overload.
- Enabled users to block notifications from selected apps when the frequency exceeds one every three seconds.
- Addressed complexities in pulling and tracing notifications across multiple applications to identify their origin.

TECHNICAL SKILLS

Languages: Java, Python, HTML, CSS, C#/C++, PostgreSQL, MySQL, Bash

Frameworks: React.js, Vue.js, .NET, Flask, Express.js

Developer Tools: Git, AWS, Jira, Node.Js, Spark, PowerBI

Concepts: Software Development Cycle, Agile Methodologies, REST API, Data Analysis, Unit Intergration/Testing, UML