

Dinusanth Surendran

Seeking May 2026 Co-op/Internship | surendrd@mcmaster.ca | LinkedIn: [in/dinusanth-surendran](https://www.linkedin.com/in/dinusanth-surendran) | Github: [dinusanth12](https://github.com/dinusanth12)

EDUCATION MCMASTER UNIVERSITY

Bachelor Of Technology, Chemical Engineering Advanced Diploma, Certificate in Business

DEC 2028

Relevant Coursework: C++ Programming, Object-Oriented Programming, Systems Engineering Fundamentals, Math 1-4

SUMMARY OF QUALIFICATIONS

- Backend-focused engineer with 3+ years building production-grade automation systems, data pipelines, and quant tools across enterprise and startup environments.
- Reduced data processing time by 90% by optimizing backends with Polars, CI/CD pipelines, and modular Python architecture.
- Tripled financial audit speeds at RBC by automating the parsing of 1,000+ transaction records/week into structured CSVs.

TECHNICAL SKILLS & CERTIFICATION

Languages: Python, C++, Java, SQL, JavaScript, VBA

Frameworks/Tools: Flask, REST APIs, Git, Firebase, Streamlit, Notion API, Matplotlib, Pytest

Systems: CI/CD Pipelines, Docker, Kubernetes, Jenkins, SAP Concur, Outlook Automation

Core Concepts: Distributed Systems, Fault Tolerance, Modular Architecture, Unit Testing, Load Testing

PROFESSIONAL EXPERIENCE

Automation Analyst - Royal Bank of Canada

MAY 2025 - DEC 2025

- Rewrote legacy Python scripts into production-grade systems for enterprise automation; pushed code into prod for high-profile clients.
- Built and deployed a backend pipeline to convert 1,000+ messy financial records/week into structured CSVs, enabling 3x faster audit reviews by reducing parsing failures and improving ledger consistency.
- Collaborated on enterprise-grade testing and CI/CD setup for production releases, improving system reliability and reducing manual QA effort by 60%.

Software Engineer - LB Connect – Mortgage Startup

JULY 2025 - PRESENT

- Collaborated directly with CTO to plan task sprints and maintain <5% bug regression rate post-release.
- Promoted to codebase gatekeeper after 2 months, approved backend code pushes, reviewed PRs, and managed production releases.
- Directed database refactor for SAP Concur exports, added indexing, error handling, and schema validation which improved consistency 4x.

CURRENT PROJECTS

Inbox-To-Insights: AI Email Summarizer + Task Engine

JUNE 2025 - PRESENT

- Engineered a task management system integrating Gmail, Notion, and Google Sheets using GPT; minimized data duplication by establishing metadata-based protocols, saving users 5 hours per week on administrative tasks.
- Integrated unsubscribe prompt detection into task management system using Python and GPT, reducing manual email filtering by 90% and saving users 3 hours per week, as one of the first features built.

Quant Backtester Pro: Modular Strategy Engine

JUNE 2025 - PRESENT

- Implemented hedge-fund style metrics (Sharpe, Drawdown) and automated reporting to validate trading strategies at scale.
- Increased code testability by 85% with CI-ready unit tests and complete separation of concerns across strategy/engine/UI layers.
- Used to simulate alpha strategies by myself and peers on 50k–100k row datasets, mimicking workflows used by quant research desks.