

Charles-Olivier Ipperciel

438-827-2307 | charlesolivieripperciel@gmail.com | linkedin.com/in/coipp/ | charlesoipperciel.github.io/PortfolioReact

EDUCATION

Université de Sherbrooke

Master's Degree in Computer Science, Part-Time

Québec, Canada

Starting Sep 2025 – Aug 2027

Université de Sherbrooke

Bachelor's Degree In Computer Science COOP Program

Québec, Canada

Jan 2022 – April 2025

HEC Montréal

Bachelor's Degree in Business Administration, 2-Year Major

Québec, Canada

Sep 2019 – Dec 2021

EXPERIENCE

Full Stack Developer

May 2024 – Present

MEDomicsLab

Hybrid

- Developed and implemented **new features** for MEDomicsLab, an **open-source** AI healthcare platform.
- Enhanced machine learning tools, improved scalability, and implemented **MongoDB** to handle larger datasets.
- Worked on frontend (**React**) and backend (**Python**) for better database communication.
- Full-time internship transitioned into a **part-time role**.
- Technologies: **Python, MongoDB, React.js, Git**.

Backend Developer

Aug 2023 – Dec 2023

Sherweb

Remote

- Developed **new features** in the billing team, fixed **bugs**, and monitored/debugged software daily.
- Integrated the Braintree software for credit card processing, replacing Paysafe in a **C#** codebase.
- Worked in an **Agile** environment with daily scrums.
- Technologies: **C#, .NET, Azure DevOps, Datadog, Octopus, Git, MySQL**.

Full Stack Developer

Jan 2023 – May 2023

Qwatro Inc.

On-site

- Built an app for tracking employee hours at construction sites.
- Developed UI/backend in **Python** with **MongoDB** as the database option.
- Aided in **ERP** selection for digital transformation.
- Technologies: **Python, MongoDB, Git**.

PROJECTS

Vitopia – Visual Simulations of Computer-Biological Entities | C++, OpenGL, Git

Ongoing

- Developing an AI 2D **shader-based** simulation to observe evolving organisms in complex societies.
- Models ecological behaviors, reactions to stimuli, and economic interactions.
- Project will be deployed online and available on **GitHub**.

Coded Kingdom | Godot, Python, Aseprite, Git

130-Hour Project

- Designed a **pixel-based** game that teaches programming through interactive gameplay.
- Players must write code and execute it to advance their characters through the levels.
- This was one of my final bachelor's projects, with all code and the latest release available on **GitHub**.

Insulin Dosage Calculator | React, Firebase, HTML/CSS, Git

Personal Project

- Developed an application that calculates **insulin dosage** for newly diagnosed type 1 diabetes patients.
- This application is used by pediatric residents to verify their written calculation results at Fleurimont Hospital.
- Hosted and deployed on **Firebase**.

TECHNICAL SKILLS

Languages: Python, Java, C#, C++, JavaScript, HTML/CSS, SQL (PostgreSQL), MongoDB (NoSQL).

Libraries/Frameworks: React, Angular.

Developer Tools: Git, Docker, Azure DevOps, Octopus, Datadog, CI/CD, Linux, Godot, Office Suite.

Video Editing: Adobe Premiere Pro, Adobe Photoshop, Pixaki (Pixel Art), Aseprite.

Linguistics: Fluent in both spoken and written French and English.