# Benedict Tobias H. Wahyudi

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### SKILLS

Frameworks React, Angular, Django, Elm, Flask, Node, Express, Spring, SQLAlchemy

Tools & Technologies Git, Unix, MySQL, Postgres, Figma, Storybook, ChartJS, Vega, Android Studio, Jenkins,

Firebase, Serverless, GraphQL, Electron, Docker

Languages C, C++, JavaScript, TypeScript, Python, Java, bash, SQL, OCaml, Elm, Rust

## EDUCATION & AWARDS

#### University of Waterloo

Waterloo, Canada

Honours Bachelor's of Computer Science, Co-op, Combinatorics Minor

September 2018 - August 2023 (Expected)

- Cumulative Faculty GPA: 85%
- Courses: OOP, Algorithms, Data Structures, User Interfaces, Concurrency, Cryptography, Venture Creation

#### Indonesian National Informatics Olympiad (OSN Informatika)

July 2018

- Ranked 12th of 8,000+ national participants and achieved a bronze medal in competitive programming in C++.

#### WORK EXPERIENCE

#### Layer6 - TD Bank Al Research Division - Full Stack Engineering Co-op

Toronto, Ontario

Elm, Vega, ChartJS, Java, Spring Framework, Docker, Elasticsearch, Figma

January 2022 - April 2022

- Redesigned overall data flow across TD's internal Model Validation Dashboard, separating UI and side-effect states improving modularity & code reuse, and enabled cross-team sharing of complex dashboard states through deep linking.
- Rewrote charts monitoring millions of credit users in Vega-lite, improving rendering performance by 500%.
- Designed and UX tested a new model import flow using wireframes in Figma and frontend prototypes in Elm.

# **SAP** - Full Stack Web & Cloud Engineer Co-op JavaScript, Node, Sinon, Mocha, Jenkins, SAP UI5

Waterloo, Canada

May 2021 - August 2021

- Optimized cached database access on the web interface for SAP's database HANA, reducing memory usage by 30%.
- Developed S3, Azure, and GCS geographical data import capability for HANA reaching 1M+ end users.
- Streamlined SQL result set exporting for analytics reports, reducing manual time by 3 hours per document on average.
- Maintained 80%+ code coverage in unit and component tests using Mocha, Sinon, and QUnit.

#### unlimited-app.com - Co-founder, Engineering Lead & Product Lead

Remote

React, NextJS, Flask, SQLAlchemy, Serverless, AWS Lambda, AWS S3, AWS Aurora

March 2021 - Present

- Developed and marketed a platform connecting young artists with small businesses, providing affordable design services.
- Over a 6-month period, acquired 700+ active users and \$6,000+ in revenue.
- Together with 3 co-founders, led a 10-person team consisting of designers, salespeople, and developers.

#### Manulife Bank of Canada - Software Engineering Co-op

Waterloo, Canada

Java, Spring Framework, JavaScript, React, Node, Electron, Storybook

September 2020 - December 2020

- Developed analytics microservice APIs for Bill Payment Reminders in Spring, reaching 10,000+ customers.
- Proposed and created testing tools using React, Node, and Electron, reducing manual testing time by over 50%.

#### Secret Mission Software - Software Developer Co-op

Toronto, Canada

JavaScript, TypeScript, React, Apollo, Django, Graphene, Gatsby, Bootstrap, Storybook, Heroku

January 2020 - May 2020

- Led the development of a real estate platform used by 4,500+ agencies and brokers throughout Toronto.
- Developed performant GraphQL backends with Graphene and Django, deployed on Heroku using GitHub Actions.

#### **GDP Labs** - AI/Machine Learning Engineer Intern

Jakarta, Indonesia

Numpy, SPARQL, Jupyter, Pandas, Matplotlib, Tensorflow

May 2019 - August 2019 and Jun 2018 - August 2018

- Researched and implemented data processing for recommendation systems using Knowledge Graph Embedding.
- Researched Time Series data processing methods to improve performance of Deep Learning fraud detection models.