Robert Attard

Software Engineer

Montreal, Canada 🕠 github.com/TanklesXL in linkedin.com/in/rob-attard/



Professional Experience

Index Exchange

Software Engineer - Go Microservices Development

- Reduced ad-registration time, from 3 hours to 15 minutes, using an event-driven architecture (Apache Kafka, Go, Watermill, Benthos), increasing effective bid counts and improving exchange efficiency and introspection capacity.

- Eliminated service development and life cycle management overhead with CI/CD and monitoring (GitLab CI, Docker, K8S, ArgoCD, Grafana), saving engineers on average 2 hours of work per week.

- Championed the adoption of new tools and methodologies across the engineering organisation, such as **Watermill & Benthos** for developing event-driven systems.
- Designed and ran experiments to improve auction efficiency and reduce billing discrepancies.
- Interviewed co-op students and assisted in their on-boarding by creating learning materials and running an "intro to Go" workshop.

Software Engineering Intern - Go Back-End Development

- Developed **REST** & **gRPC** services for programmatic partner configuration, eliminating the need for manual intervention.
- Minimized dependencies on operations personnel by authoring CI/CD pipelines for web services (GitlabCI, Go, Bash).

Matrox Imaging, Software Engineering Intern - C# Desktop Application Development

- Extended application functionality additional image processing and manipulation (C#, WPF, XAML).
- Instrumented distributed testing across local machines with **Jenkins**, reducing full UI test runs from 4 hours to 30 minutes.

12/2019 - 07/2022 Montreal, Canada

05/2019 - 08/2019

Montreal, Canada

05/2018 - 12/2018 Montreal, Canada

Education

Bachelor of Computer Engineering (BEng), McGill University

2015 - 2019 Montreal, Canada



Projects

Gleam, A Statically Typed Language for the Erlang VM □

- Provided design input for the language and standard library.
- Contributed tooling, standard library and external functionality. (Gleam, Rust)

Glint, Create CLI applications with Gleam □

- Created a framework for building CLI applications with flags and auto-generated help messages.

Gladvent, An Advent of Code framework for Gleam □

- Used Glint to build a framework for writing & running Advent of Code solutions in Gleam.
- Leveraged the BEAM to run solutions concurrently with configurable timeouts.

Tastings, A simple spirits tasting aide □

Built a web app built with Elixir, Phoenix LiveView & Gleam that scrapes masterofmalt.com to filter and display relevant product details and sensory information.



Skills

Languages — English, French, Italian • **Programming Languages** — Go, Gleam, Bash, Elixir, Erlang, C, Rust ● **Development Tools** — *Linux, Git, GitLab CI, Docker,* Kubernetes, Apache Kafka, Grafana, Prometheus, InfluxDB, MySQL



Certificates

Professional Scrum Master 1 (PSM) □ Certified through scrum.org