Yasen Behiri

yasen.ca ybehiri@uwaterlooca linkedin.com/in/yasenbehiri github.com/smolbrainer

EDUCATION

University of Waterloo

September 2025 - April 2030

Bachelor of Software Engineering - Honors/Co-op, Joint Honors Computing & Optimization

GPA: 3.93/4.0

• Relevant Coursework: Object-Oriented Programming, Programming Principles, Embedded Systems, Data Structures

EXPERIENCE

Founding Engineer

 $September\ 2025-Present$

Heavy Influence

Toronto, ON

- Launched React Native creator app from scratch; delivered MVP in 6 weeks and onboarded 120 creators by beta
- Integrated Meta, TikTok, YouTube with OAuth + Apple, enabled multi-account linking and 99% auth success
- Built timezone-aware scheduler with Cloud Tasks + Cloud Scheduler; processes up to 10K jobs/day
- Designed Firebase backend for accounts, subscriptions, and scheduled posts; supporting up to 300K+ posts/month

Machine Learning Engineer

September 2025 – Present

Waterloo, ON

WatStreet
Achieved 968% CIFAR-10 accuracy by optimizing PyTorch training; cut training time by 12%

- Built Monte Carlo (5,000+ paths/contract) option engine; 8% average error vs Black-Scholes benchmarks
- Built multi-agent US economy simulator; **LLM**-guided Person policies and aggregator A map actions—interest rates
- Jointly trained shared policy P(d, s) and A on historical macro signals; enabled differentiable forecasts

Software Engineering Intern

May 2025 – August 2025

Savi Finance

Toronto, ON

- Launched Social Insights dashboard in React/Redux, rapidly scaling to 1K+ weekly active users in 6 weeks
- Built Chrome extension to auto-sync checkout data across platforms, cutting manual transaction entry by 90%
- Engineered GraphQL API with Apollo, achieving 2x response time while handling 50K+ transactions/month
- Integrated Coinbase Wallet sync for 13K+ accounts, achieving 952% automated balance accuracy
- Implemented tests with Jest and Cypress, increasing deployment reliability and maintaining 92% code coverage

PROJECTS

TradeSmart AI | React, Flask (Python), Random Forest, Chartis, Firebase

- $\bullet \ \, \text{Built a full-stack trading platform with } \textbf{React} \ \, \text{and } \textbf{Flask}, \, \text{enabling real-time stock and trade tracking and simulations}$
- Designed dynamic, interactive financial charts using Chartjs and used Firebase for seamless real-time data syncing
- Improved performance with 24-hour prediction caching, lazy loading, and a responsive glassmorphism UI
- Implemented Random Forest models using 25+ features to generate 1-year price forecasts with confidence scoring

StepGuide | Python, PyTorch, OpenCV, YOLOv11, COCO, Coqui TTS, TensorRT

- Built an assistive wearable using Python, PyTorch, and OpenCV for the visually impaired
- Enabled 30+ FPS real-time object detection and accurate audible navigation through integrated speech output
- Trained and deployed a custom YOLOv11 model on COCO, reaching 96% accuracy across 80+ classes
- Integrated Coqui TTS for continuous, context-aware real-time narration of detected surroundings
- Optimized inference via PyTorch to ONNX to TensorRT pipeline with FP16 precision
- Achieved 120ms latency on an Nvidia TPU using parallel GPU acceleration for efficient edge deployment

Get "Stuff" Done | React Native, FastAPI, Stripe, Twitter/X API, OpenAI, Gemini, MongoDB

- Developed a full-stack **React Native** + **FastAPI** app that gamifies habit tracking for better accountability
- Implemented penalties like spam texts, AI calls, donations, and public Twitter/X posts when tasks are missed
- Built secure payment flows with Stripe for auto donations, resolving OAuth and webhook issues for reliable execution
- Designed MongoDB schema and event-driven backend for habits, penalties, and uploads, ensuring 24/7 operation
- Leveraged OpenAI & Gemini LLMs with Fetchai agents for dynamic text generation and SMS voice prompts

Cryptocurrency Twitter Bot | Python, Tweepy, RegEx

- Developed a Python Twitter bot that searches for tweets containing contract addresses of new cryptocurrencies
- Automated data extraction using the Tweepy library to help users discover emerging crypto projects
- Implemented RegEx to filter and validate contract addresses from tweets, streamlining crypto project discovery

TECHNICAL SKILLS

 $\textbf{Languages:} \ \ Python, \ C, \ C++, \ Java, \ JavaScript, \ Ruby, \ SQL, \ HTML, \ CSS, \ MATLAB$

Frameworks/Libraries: React, React Native, Node.js, Ruby on Rails, GraphQL, Firebase, MongoDB

Tools & Platforms: Git, Linux, Docker, MySQL, Jira, Postman, GTest, Google Cloud