Yasen Behiri

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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
WatStreet   *Waterloo, ON*
- Achieved **96.8% 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 **95.2% 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, Chartjs, Firebase*
- Built a full-stack trading platform with **React** and **Flask**, 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

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