# Aaron Tibben - Software Developer

GitHub | Linkedin | Portfolio | Aaron.Tibben@gmail.com

## **SKILLS**

React, Angular, RXJS, Javascript, Typescript, HTML, CSS, GIT, SQL, Linux, C#, .Net

#### **WORK EXPERIENCE**

### Ross Video | Programmer Analyst | Iroquois, ON | Nov 2023 - Feb 2025

- Migrated C# ETL pipeline to SQL server agent jobs, heavy data processing was left in C#. Properly closed database connection which reduced network traffic increasing database write time performance by 82.4%
- Collaborated with stakeholders to update legacy SMT (surface mount technology) systems, migrating existing services to a
  new vendor using C# and SQL. Replacing 3 SMT lines with 1 line which increased worker productivity by 220% and reduced
  component wastage by approximately 8%
- Developed Grafana dashboards for shop floor reporting and continuous monitoring using HTML, CSS, JS and SQL;
   Providing real time visibility on product statuses and resolving incorrect labour calculations
- Spearheaded frontend architecture and development on a form CMS (content management system) using Angular, HTML, CSS, Typescript, RXJS; allowing non technical manufacturing team members to launch their own data logging applications
- Assumed responsibility for a C# .net REST API project when a senior team member resigned. Maintaining and developing new endpoints for frontend developers until a replacement was found

## Ross Video | Manufacturing Systems Specialist | Iroquois, ON | Dec 2022 - Nov 2023

- Removed approximately 25,000 lines of code across Angular applications and reduced zone js calls by about 6% by developing a form library compatible with template and reactive forms
- Mapped TypeScript data types and interfaces from incoming JSON and XML data; enforced stricter typing, leading to a reduction in application bugs and improved matching for the LSP
- Refactored C# file saver utility to facilitate batch inserts of text files into SQL Server by removing exclusive lock on table, reduce unnecessary data reads, and normalized data from first to second normal form dropping execution time from 15 minutes to ½ a second per 10,000 files
- Diagnosed and resolved various TCP/IP network, hardware and software related issues on internal and vendor specific manufacturing equipment saving roughly 8-12 production hours per annum
- Provided technical support to vendors deploying 3rd party software. Providing credentials and remoting into various virtual machines and servers

#### Ross Video | SMT Line Operator | Iroquois, ON | Feb 2021 - Dev 2022

- Discovered, documented and reported various software issues to Operational Software Technology department
- Inspected components on PCB boards for quality and defect issues
- · Provided technical support and training to junior SMT Operators

# PERSONAL PROJECT

### MFG | March 2025

My approach to the "job shop scheduling problem". Project includes ABAC permissions, authentication, job queues, code splitting/lazy loading, data storage, 'job optimizations' and etc... READ.MD has more technical information

- Client-server architecture, structured as a monolith, using domain driven design and hexagonal architecture pattern
- Developed RESTful API with Golang using Huma to write 3.1 OpenApi specification
- Hosted on a (virtual private server) VPS using Traefik for load balancing, rate limiting, reverse proxies
- Docker containers with Bash scripts for configuration for deployment
- · Postgres for a RDBMS database, Redis for caching, raw SQL queries and Tern for database migrations
- · React, JSX, Typescript for (single page application) SPA, using Ant Design as a UI library, webpack for bundling

# **EDUCATION**

Seaway District High School | Secondary Diploma | Iroquois, ON | June 2019

Awards: Introduction to Computers (2017), Computer Science (2018), Computer Science (2019)