# Atri Hegde

#### **Education**

SEP 2022-JUL 2027

University of Sheffield - Integrated Masters in Software Engineering (Year in Industry)

**On Track for a 1st.** Relevant Modules: Software Hut (91%), Functional Programming (88%), Java Programming (86%), Introduction to Software Engineering (78%)

SEP 2020-AUG 2022

Reigate College - A-Level Maths, Physics, Chemistry, Computer Science (AAAA)

OCT 2018-AUG 2020

St Bede's School - 11 GCSEs, including Maths, English Language

# **Technical Skills**

Java: JavaFX, Java Swing, Java Spring, JUnit Testing

Ruby: Ruby on Rails, Devise, Sinatra

**Python:** NumPy, Matplotlib, Pandas, Flask, Seaborn C#: ASP.NET Core, EF Core, Avalonia UI, Uno Platform

Web Dev: Next.js, Angular, Typescript, tRPC, TailwindCSS

Framer Motion, Resend, NGINX, Certbot

DB: MySQL, libSQL, SQLite, PostgreSQL, MSSQL

DevOps & Tools: Nix, Docker, Docker Compose,
Digital Ocean, Azure, AAD, AWS, OAuth, Linux,
Microsoft Power Automate, Windows Server
Applications: Microsoft 365, Notion, Emacs

Neovim, Loom, Vercel, Figma

Other Languages: Rust, GoLang, Haskell, Shell, ROS, ROS2

# **Work Experience**

## ROS2 Development tools (University of Sheffield)

JUN 2024-Present

- Proposed and designed a plan for multi-platform development for ROS2 with Turtlebot3 waffle robots for the University of Sheffield, working under the Multidisciplinary Engineering Education Department.
- Leveraged risk management skills to make a contingency plan
- Implemented and documented the system using Nix, then Docker (docker-compose)
- Created readable and maintainable code with documentation/user instructions

### Founder of LiteSite Limited (https://litesite.uk)

MAR 2024-Present

- Founded a company that creates websites and provides digital infrastructure for businesses
- Collaborated with business partner to draw up contracts and perform accounting tasks
- Leveraging CI/CD, Linting tools, Full Stack development, Deployment Pipelines, Uptime monitoring, CRM, Marketing Funnels, Automations and analytics tools
- Using Agile Development principles to accelerate time to production
- Honed communication and problem-Solving skills with Sales and Demo calls with clients

Legal and General JUN 2022

- Gained work experience for 1 week shadowing the Head of Services
- Automated a 4 step manual, cross departmental process into an automated pipeline whilst logging results to Excel sheets as required

## **Projects and Experience**

# Digital Catalogue and Inventory Management for APSL

- JAN 2024-MAY 2024
- Lead a team of 7 to design and implement a software solution to digitise the current paper based management of experiments and materials for the Advanced Polymer Sintering Laboratory at the University of Sheffield
- Developed a software solution using Ruby on Rails, Devise for SSO, GitLab and Agile programming concepts
- Used Leadership skills to smoothly plan and manage project for 2+ months

### Engineering You're Hired!

JAN 2024

- Worked in a multidisciplinary team across various engineering disciplines for a week
- Researched challenges and solutions in 3D printing in additive manufacturing
- Prepared a presentation and technical bid for our idea, presented to peers and staff, and took spontaneous open-ended questions and objections

Chess Piece Classifier NOV 2024-DEC 2024

- Designed and Implemented a Machine Learning Algorithm (classifier)
- Used k-Nearest Neighbour classifier
- Reduced Dimensionality using Principal Component Analysis (PCA) and Linear Discriminant Analysis (LDA)
- Transformed images into feature vectors and implemented filters to enhance performance

LifeOS NOV 2023

- Participated in HackSheffield8 (hackathon)
- Collaborated in a team of 3 under high pressure (26 hours)
- Used Next.js with Typescript, OAuth, tRPC, ESLint, Prisma, TailwindCSS and PostgreSQL
- Awarded the "Best Use of AI"

## Trains of Sheffield - Electronic Point of Sale System

OCT 2024-DEC 2024

- Collaborated with 3 other students to capture requirements, design and implement a system in Java (Java Swing, Java Spring, MVC Architecture)
- Used UML diagrams to define requirements and implemented its database in MySQL
- Produced a written report of the whole project including requirements, justifications, testing and teamwork

## References upon request