Vraj Shah

Professional Summary

A highly motivated software developer with expertise in Python, FastAPI, SQL, and data processing, passionate about building scalable data-driven solutions. Seeking to leverage my experience in database optimization, API development, and data manipulation to contribute to Data Platform and drive innovation in the industry.

Technical Skills

 $\textbf{Languages} \hbox{:} \ Kotlin, Swift, Java, JavaScript, TypeScript, Python, SQL, C\# (Basic) \\$

Frontend Development: ReactJS, Next.js, Angular, HTML5, CSS3, Bootstrap, NPM

Data Processing & Analysis: Pandas, OpenCSV, ETL Pipelines, Data Cleaning, Data Transformation Backend Development: FastAPI, Node.js, Spring Boot (Java/Kotlin), RESTful APIs, API Optimization

Databases: MySQL, PostgreSQL, MongoDB, SQLite, SQL Server, Oracle

Cloud & DevOps: AWS, GCP, Azure, Docker, Kubernetes, Distributed Systems, Firebase, CI/CD Pipelines (GitHub Actions, GitLab CI)

Testing & Version Control: JUnit, Mockito, Espresso, API Performance Tuning, Debugging, Code Reviews, Git

UI/UX: Figma, Wireframing, Accessibility (WCAG)

Soft skills: Strong communication, Problem solving, Teamwork and collaboration, Adaptability, Attention to detail, Critical thinking, Time management, Ability to learn continuously

Work Experience

Simform Solutions Dec 2021 - Nov 2023

Software Engineer Ahmedabad, India

• Collaborated with cross-functional teams to design and develop high-performance APIs using FastAPI and Python, reducing response times by 40%.

- Designed scalable backend services with Spring Boot (Java/Kotlin) and Node.js, improving API efficiency by 35%, enabling seamless multi-user interactions.
- Optimized complex SQL queries in PostgreSQL and MySQL, improving database efficiency and reducing execution times by 30%.
- Implemented Pandas-based data pipelines, automating data transformation tasks and ensuring data integrity for large-scale fintech applications.
- Streamlined CI/CD pipelines using GitHub Actions and GitLab CI, reducing deployment time by 50% and enhancing release efficiency.
- \bullet Conducted thorough debugging and troubleshooting, reducing system failures by 50% through proactive issue resolution and performance tuning.
- Engaged in code reviews and version control workflows using Git and GitHub, improving code quality and collaboration across teams.

Education

Dalhousie University Jan 2024 - Sep 2025

 $\textit{Master of Applied Computer Science (Co-op \ Candidate)} \mid \textit{GPA: 4.07/4.3}$

Charusat University

Jun 2018 - Apr 2022

Bachelor of Computer Engineering | GPA: 8.7/10

Projects

 $\textbf{ServiceHub} \mid \textit{Source Code} \\ \textbf{ReactJS} \mid \textbf{Spring Boot (JAVA)} \mid \textbf{MySQL} \\$

- Developed a scalable web application using ReactJS, implementing modular UI components for a seamless user experience. Integrated lazy loading and performance optimizations, reducing page load time by 40%.
- Applied Object-Oriented Programming principles (e.g., classes, objects, inheritance) to design modular and reusable code for the backend, ensuring maintainability and scalability.
- Architected backend using Java Spring Boot and integrated it with a ReactJS frontend, achieving 99.9% uptime and enabling seamless real-time interactions among over 1,000 active users.

K8s Microservices | Source Code

Spring Boot (Kotlin) | Kubernetes | Docker | CloudBuild

- Implemented Kubernetes-based microservices architecture, creating a highly available system with two Spring Boot containers, ensuring secure communication and fault tolerance between services.
- Deployed microservices using Kubernetes and automated deployment processes with CloudBuild, improving deployment speed and scalability by 40%.
- Worked with Docker containers to facilitate easy application deployment, increasing the speed of testing and production cycles while ensuring a consistent environment across development and production.

ETL on Tweets Data

 ${\bf Python} \mid {\bf Pandas} \mid {\bf CSV} \mid {\bf MySQL} \mid {\bf GCP}$

Halifax, Canada

Gujarat, India

- Developed an ETL pipeline using Pandas and Python to process and analyze large tweet datasets, automating data extraction, transformation, and loading into a MySQL database.
- Optimized SQL queries and implemented indexing, reducing query execution time by 40% and improving overall data retrieval speeds.
- Designed a distributed database system using MySQL on GCP, enabling real-time data analysis and ensuring high availability.

Vraj Shah

shahvraj2016@gmail.com +19029941436 22 Feb 2025 LinkedIn | GitHub | Portfolio | LeetCode | HackerRank

Hiring Team WorkSafeBC

Subject: Application for Co-op Student, Software Developer

Dear Hiring Team,

As a Master of Applied Computer Science student at Dalhousie University, I am eager to bring my technical expertise and passion for innovation to your Innovation Strategy and Services team. With a strong background in software development and a keen interest in rapid prototyping, I am excited about the opportunity to contribute to projects that make a meaningful impact on workers and employers in B.C.

Throughout my academic and professional journey, I have developed robust skills in mobile and backend development, working extensively with Kotlin, Swift, and SQL. My experience includes building scalable applications, optimizing memory management, and leveraging cloud technologies to enhance system efficiency. Additionally, my contributions to open-source projects, particularly in automating boilerplate code with Cookiecutter, reflect my drive for innovation and efficiency. I have also worked with dependency injection frameworks like Hilt and used technologies such as OkHttp and Retrofit for API integration. Writing unit tests using JUnit, Mockito, and Espresso has strengthened my ability to ensure software reliability and maintainability.

In addition to mobile development, I have experience working with Python, C#, and .NET for backend and web applications. I am familiar with SQL Server and have worked with Web APIs using C# and .NET Core. Furthermore, I have explored machine learning frameworks such as PyTorch and TensorFlow, applying them in academic projects to develop intelligent systems. My coursework in data management and warehousing has provided me with a strong foundation in handling structured data, which could be beneficial for WorkSafeBC's initiatives.

Beyond technical expertise, I thrive in collaborative environments where problem-solving and creativity are valued. I enjoy engaging in technical research, participating in hackathons, and exploring emerging tools that push the boundaries of conventional software development. My adaptability and analytical thinking enable me to propose innovative solutions and contribute to a culture of continuous learning.

The opportunity to work alongside experienced professionals in a team that values innovation and rapid development excites me. I am available for a four-month co-op term starting in May 2025, based on WorkSafeBC's needs. I would welcome the opportunity to further discuss how my skills and experience align with the goals of WorkSafeBC.

Thank you for your time and consideration. I look forward to hearing from you.

Sincerely, Vraj Shah

Academic Record - Shah, Vraj Sunilkumar (B00979965)

Jan 08, 2025 12:47 am

CSCI

For information relating to the transcript see the transcript key (https://www.dal.ca/admissions/registrars_office/transcript_key.html)



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D

Adv. Topics in Web Development

Degrees/Diplomas and Honours Awarded

This is NOT an official transcript.

inis is NOT all official transcript.												
Credit Hrs	<u>Grade</u>	<u>Median</u> <u>Grade</u>	<u>Enrol</u>									
Master of Applied Comp Science: Computer Science												
03.0	B+											
In Good Standing												
<u>This is NOT an official transcript.</u>												
Credit Hrs	<u>Grade</u>	<u>Median</u> <u>Grade</u>	<u>Enrol</u>									
Master of Applied Comp Science: Computer Science												
03.0	A+											
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2024/2025 Fall						Credit Hrs	<u>Grade</u>	<u>Median</u> <u>Grade</u>	<u>Enrol</u>			
CSCI	D	5409	2	Adv Topic in Cloud Compu	ıting	03.0	A+					
CSCI	D	5411	2	Advanced Cloud Architecti	ing	03.0	Α					
CSCI	D	5708	2	Mobile Computing		03.0	A+					
CSCI	D	9890	2	Internship Preparation		0.00	PASS					
In Good Standing												
This is NOT an official transcript.												
GRADES NOT AVAILABLE									<u>Credit Hrs</u>			
Current Program: 2023/2024 Winter												
Master of Applied Comp Science: Computer Science												
2023/20	24 W	inter		CSCI	D 3901 1	Software Development Concepts			6			
Current Program: 2024/2025 Winter												
Master of Applied Comp Science: Computer Science												
2024/20	25 W	inter		CSCI	D 5501 2	Deep Learning	Applications	i	3			
2024/20	25 W	inter		CSCI	D 5601 2	Designing for U	X		3			
	<u>This is NOT an official transcript.</u>											