# **Abhineet Kalra**

133 Agro Street, Waterdown, ON, Canada, L8B 1X9 • ak5345@nyu.edu • (437) 545-5035 • LinkedIn

#### **Technical Skills:**

- Programming Languages: Java, Python, Q, JavaScript, Scala, Bash, Gradle, C#
- Databases: PostgreSQL, Elastic Search, Redis, SingleStore, KDB, Hadoop-Database, Cassandra
- Packages / Technologies: AWS, Unix, JIRA, Git, Kafka, FIX, Zookeeper, Spring, Confluence, ExtJs, Jupyter, Spark, GCP, Fitnesse, Mockito

# **Professional Experience:**

### CPP Investment Board | Lead Engineer

Toronto, Canada | January 2024 - Present

- Helm the Total Fund Management team, orchestrating risk management and rebalancing a \$350B+ portfolio through trailblazing cloud-native solutions.
- Contribute to multiple containerized Python cloud applications, empowering portfolio management teams to execute and visualize compute-intensive models.
- Leading several key initiatives to drive business objectives, ensuring adherence to engineering best practices such as removing unused features and enhancing the automated testing framework.

#### Goldman Sachs | Lead Software Engineer

New York, USA | January 2022 – November 2023

- Chief architect of a real-time distributed electronic trading platform built in Java, adept at processing, enriching, and transforming live events.
- Reengineered a monolithic system into a stateless, asynchronous masterpiece leveraging Kafka and Zookeeper, achieving unparalleled horizontal scalability.
- Commanded 4+ projects, onboarding diversified clients, venues, and products, driving \$10M+ in revenue.
- Conducted groundbreaking POCs to migrate Elastic Search databases to cloud solutions like SnowFlake and SingleStore, earmarking \$2M in annual savings.
- Mentored a global ensemble of 4 developers, fostering a culture of scalable, maintainable code.

# Goldman Sachs | Associate S/W Developer

New York, USA | August 2020 - December 2021

• Optimized Java-based trading applications, achieving a 20x surge in volume handling (from ~40M to ~800M order events) while maintaining sub-second latency.

• Initiated an automated regression testing environment, slashing manual testing efforts by ~80%.

CPP Investments Classification: Internal

#### Tradeweb Markets LLC | Senior Full Stack S/W Developer

New York, USA | October 2019 - July 2020

- Integral member of the real-time trading applications team, enhancing a retail-targeted trading platform.
- Developed and maintained back-end low-latency microservices with Spring-boot, Kafka, Cassandra, and Zookeeper.
- Conceptualized and implemented a new negotiation widget for fixed-income products.
- Spearheaded advancements in the JavaScript-based front-end web application (Tradeweb Direct).

#### Millennium Management LLC | Software Engineer

New York, USA | July 2017 - October 2019

- Contributed to the equities post-trade analytics team, developing an application for real-time risk, positions, and P&L management for 200+ portfolio teams.
- Engineered a Java-based order management system for real-time position calculations.
- Integrated risk systems with diverse data sources, halving the application startup time.
- Developed multipurpose client libraries in Java, C#, Python, and Q, simplifying data retrieval from KDB+ gateways.

## **Education:**

## New York University | Graduate School of Arts and Science

New York, USA | September 2015 - May 2017

• Master of Science, Computer Science, GPA: 3.72

#### Guru Gobind Singh Indraprastha University

Delhi, India | September 2011 - May 2015

• Bachelor of Technology, Information Technology, GPA: 3.9