

# Kathir Meyyappan

[kathirmey@gmail.com](mailto:kathirmey@gmail.com) | [linkedin/kathirmeyyappan](https://www.linkedin.com/in/kathirmeyyappan) | [github/kathirmeyyappan](https://github.com/kathirmeyyappan) | [kathirm.com](http://kathirm.com)

## EDUCATION

---

### University of Chicago

Chicago, IL

*Mathematics + Computer Science; GPA: 3.94*

*September 2022 – June 2026*

- Relevant Coursework: Database Systems (Graduate), Machine Learning, Speech Technologies (Graduate), Adversarial ML, Operating Systems, Algorithms, Abstract Algebra, Real Analysis, Topology, Formal Languages, Probability Theory
- Involvement: Algo Group (President), Japanese Animation Society (Vice President), ChiData (Undergrad Researcher)
- Distinctions: Robert Maynard Hutchins Scholar (top 10%), Dean's List, 3x AIME Qualifier

## EXPERIENCE

---

### Notion

San Francisco, CA

*Software Engineer Intern*

*September 2025 – December 2025*

- Designed a framework to create custom integrity checks that regularly report on ~200 Postgres database shards
- Reduced diagnosis time on schema drift incidents from days to minutes, removing need for manual investigative queries
- Initiated DevEx efforts to create a remote, durable workflow that automates complex + long-running schema migrations
- Investigated and migrated high-traffic (2M+ QPS) Redis clusters, reducing blast-radius for Notion's caching layers

### Arrowstreet Capital

Boston, MA

*Quantitative Developer Intern*

*June 2025 – August 2025*

- Worked in Research Group, developing high-performance core Python libraries to increase alpha research productivity
- Built an end-to-end distributed computing framework for processing larger-than-memory batches of financial tick data
- Implemented load balancing and caching mechanisms to increase job capacity 1500x using Polars and AWS Athena
- Explored cross-asset research benefits in using LLMs for empirical feature extraction on over 2.5 million bond filings

### Amazon

Palo Alto, CA

*Software Development Engineer Intern*

*June 2024 – August 2024*

- Increased AWS DataZone's database performance—used bitmaps to speed up numeric aggregation queries by over 20x
- Implemented histogram generation feature, allowing for more granular client-side access to numerics in the database
- Architected Entity Store inspection utilities, facilitating the use of REST-based database communication protocols
- Created 7 critical API endpoints, enabling access to internal DynamoDB and S3 storage frameworks for sev forensics

### ChiData

Chicago, IL

*Undergraduate Researcher*

*October 2024 – Present*

- Infrastructure-related work on relational database system CrocodileDB under Prof. Aaron Elmore @ UChicago
- Implemented result caches and query subplan detection in Rust to reduce compute redundancy and boost query efficiency
- Wrote end-to-end DB persistence mechanism (via shutdown-time serialization) for volatile state recovery upon reboot

### Institute of Politics

Chicago, IL

*Software Developer*

*October 2023 – January 2024*

- Identified malicious false-citation practices in 200 political flyers with University of Chicago Institute of Politics
- Utilized LLM (Llama2) + regex to identify 1000+ misinformation sources and pipeline data into Google Drive workflow

### Dräger

Andover, MA

*Software Engineer Intern*

*June 2023 – September 2023*

- Solved defect-tracking bottleneck in product lifecycle by automating issue reporting, reducing Jira traffic by 85%
- Developed, documented, and deployed internal desktop application that streamlines quarterly FDA communication process
- Wrote OpenXML C# scripts that execute 2500+ JQL (Jira Query Language) queries per day to generate and file reports

## TECHNICAL SKILLS

---

**Programming Languages:** Rust, Python, C, TypeScript, Go, C#, R, SQL

**Tech:** AWS, Postgres, Redis, Memcached, DynamoDB, Terraform, Grafana, Polars, PyTorch, Docker, Honeycomb, pganalyze

**Languages:** English, Japanese, Tamil