

Timothy H Chang

SKILLS

Languages:

Kotlin, TypeScript, Python, SQL, R, JavaScript, Java

Cloud & Infra:

AWS, Snowflake, Docker, Airflow, Kafka, Spark

Databases:

PostgreSQL, MySQL, Redshift, DynamoDB, Hive, Presto

Engineering:

Microservices, Pub/Sub, Scaling, Data Governance, CI/CD, Git

MORE

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847-302-7992

linkedin:

linkedin.com/h/timothyhchang

youtube:

youtube.com/timc3406

EDUCATION

M.S. Analytics

University of Chicago
2018 – 2021

M.S. Mgmt Info Systems

Univ. of Illinois Chicago
2013 – 2015

B.A. Economics

Northwestern University
2005 – 2009

EXPERIENCE

SR. DATA ENGINEER • INSTAGRAM • MAY 2025 – MAY 2026

Supported feature development for the Instagram Ads Creation platform targeting new campaign objectives including sales, offsite conversions, and ads delivery optimization. Reduced pipeline compute costs by 35% through query and pipeline optimization. Instrumented logging events to capture advertiser and user signals feeding conversion tracking and ads delivery systems. Conducted A/B experimental analyses across user segments using demographic, behavioral, and campaign attributes to measure feature impact. Developed React dashboards and maintained data pipelines to monitor campaign health, latency, and reliability metrics, driving a 2% lift in ad campaign creation rates.

SOFTWARE ENGINEER • AMAZON • SEP 2022 – MAY 2025

Led backend development of the LEAP (Launch Execution of Amazon Products) platform, cutting device launch cycle time by 40% across 10+ hardware product lines. Built internal automation tools and scheduled workflows to register device features — including Alexa and Frustration Free Setup — across hardware product lines. Reduced critical launch defect rate through an automated validation system used by 200+ engineers across 8 teams.

DATA ENGINEER • META • MAY 2020 – SEP 2022

Built identity resolution systems on the Central Product Platform, improving cross-product user match accuracy across Facebook, Instagram, and WhatsApp. Engineered scalable ML feature pipelines in Python/Spark processing 10TB+ of daily user signals for identity matching and personalization. Delivered a self-serve framework adopted by 5 product teams, reducing onboarding time from 6 weeks to under 1 week.

SOFTWARE ENGINEER • OPPFI (OPPLOANS) • SEP 2019 – JUN 2020

Designed and built backend microservices and ETL pipelines (Python, Airflow, Snowflake, AWS) reducing loan decisioning latency from 4 hours to under 15 minutes.

SOFTWARE ENGINEER • VILLAGEMD • MAR 2019 – SEP 2019

Engineered a real-time clinical data platform (Kafka, Airflow, AWS, Flask) integrating 6 data sources across 300+ care locations for 1M+ patients.

DATA ENGINEER • EVOLENT HEALTH • APR 2018 – MAR 2019

Built data services and analytics pipelines processing claims and clinical data for 500K+ members, supporting value-based care reporting across 3 health systems.