

David Hanan Li

2465 Lancashire Dr, Apt1A, Ann Arbor, MI

<https://hanan.li>

<https://gatech.joinhandshake.com/users/28172256>

hananli@gatech.edu | 734-548-7879

EDUCATION

Georgia Institute of Technology, Atlanta GA

Master of Science in Computer Science, Systems Specialization

Anticipated Graduation Date: December 2021

Relevant Courses: *Advanced Operating Systems, Cloud Systems, Big Data Systems,
Database System Design*

GPA: 4.0

University of Michigan, Ann Arbor MI

Graduated May 2020

Bachelor of Science in Computer Science

GPA: 3.823

Bachelor of Science in Data Science

Relevant Courses: *Operating Systems, Machine Learning, Web Systems, Data Structures and Algorithms*

EXPERIENCE

Google, Mountain View CA

Software Engineer Intern

May 2021 - Current

- Responsible for metadata syncing of internal metadata catalog team.
- Increased availability of a metadata field by at least **5% so far** by building a data processing pipeline in **C++** to sync in data from another source.
- Designed and added new commands to command line tool using **C++** to allow
- Analyzed and optimized data processing pipeline performance through sharding and filtering.

Microsoft, Seattle WA

Software Engineer Intern

May 2019 - August 2019

- Responsible for performance optimization for backend service in an internal Microsoft Advertising team.
- Improved Authentication API speed by **10%** on average by optimizing **.NET C#** service's architecture.
- Lowered **.NET** service's garbage collection active time by **20%**, decreased service's commit size RAM by **25%** by changing the backend software architecture of service.
- Analyzed system performance and changed software architecture by utilizing regular and **REDIS** caches

Intel, Shanghai China

Software Engineer Intern

July 2018 - August 2018

- Increased availability for CI web application by **50%** by implementing load-balancing and containerization solutions to web application using **HAProxy** and **Docker**
- Upgraded internal CI web application tool in **Django** from **Python 2** to **Python 3**

RESEARCH

Miniature Tether Electrodynamics Experiment (MiTEE), Ann Arbor MI

Assistant Lead of Command and Data Handling Sub-team

January 2019 – August 2020

- Assistant lead
- Developed custom **file system** for cube satellite using **C**, communicating with hardware through **SPI**
- Led team to build real time visualization dashboard for satellite's data using **Python Flask** and **Javascript**
- Designed MiTEE's public website, using **HTML** and **Bootstrap CSS**

Dynamic Project Management Lab, Ann Arbor MI

Research Assistant

September 2019 - June 2020

- Built **Digital Twin** real time tracking system of robots in construction site with latency of **1.2 seconds** using **Unity** and **Microsoft Azure**.
- Designed and implemented system to track and store brick locations and update blockchain smart contract using **Microsoft Azure IoT** and **Microsoft Azure Blockchain Workbench**.
- Implemented **Reinforcement Learning** algorithm for Digital Twin robots in **Unity C#**

SKILLS

Programming Languages:

C++, C, C#, Python, HTML, CSS

Frameworks and Services:

Unity, .NET, pyTorch, Flask, React, Docker, HAProxy