

# Yining Shi

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Ann Arbor, MI

<https://eddshi.xyz/>

## Education

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**University of Michigan**, Ann Arbor, MI

Bachelor of Science in Computer Science

Aug. 2022 – Current

## Honors & Awards

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**University of Michigan Blue Ribbon Award**, Ann Arbor, MI

Apr. 2024

**University of Michigan University Honors**, Ann Arbor, MI

2022 – 2024

## Academic Presentations

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**University of Michigan UROP Symposium**, Ann Arbor, MI

- Shi, Y., Ashley, W., & Kon, P. *Unveiling the Nexus: Harnessing IoT Ecosystems for Evading Internet Censorship* [Poster]. (**Blue Ribbon Best Posters Award**)  
University of Michigan UROP Spring Symposium, Ann Arbor, MI, United States, 2024.  
[https://eddshi.xyz/papers/nexus\\_poster.pdf](https://eddshi.xyz/papers/nexus_poster.pdf)

## Research Experiences

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**Computer Science and Engineering Department**,

**University of Michigan**, Ann Arbor, MI

Research Assistant, advised by Professor Ang Chen

Jan. 2024 – Current

- Collaborating with Patrick Tser Jern Kon, Wyatt Ashley, and Prof. Chen on a novel circumvention model, *Nexus*, utilizing distributed Internet of Things network systems against on-path attacks, circumvent censorship, and traffic surveillance from nation-state adversaries.
- Poster awarded Blue Ribbon at the UROP Symposium, University of Michigan.
- Aiming to publish at **PETS/PoPETs 2026**.

**Censored Planet, University of Michigan**, Ann Arbor, MI

Research Assistant, advised by Professor Roya Ensafi

Jun. 2023 – Aug. 2023

- Conducted research under Professor Roya Ensafi and PhD student Anna Ablove on Internet Measurement data collection and analyses for a project concerning the growing trend of Geo-blocking ingress traffic from outside networks by both heavily censored and traditionally “free” nation-states.
- Developed the lab’s official website and optimized the data fetching mechanism to improve server efficiency and cut costs.

**Civil and Environmental Engineering Department**,

**University of Michigan**, Ann Arbor, MI

Research Assistant & Developer, advised by Dr. Wentao Wang

Oct. 2023 – Dec. 2023

- Engineered an IoT sensor-node solution using Microchip Curiosity Nano for confined spaces, achieving a 100KHz transmission rate.
- Developed firmware in C for sensor data transmission, storage, and LTE-based uploading, with a focus on cost efficiency.

## Technical Skills

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- **Languages:** Python, SQL, C++, C, HTML, CSS, Ruby, R, Javascript, Golang
- **Frameworks:** Flask, Node.js, Ruby on Rails
- **Development Tools:** VS Code, Docker, Git, MPLab, WireShark, WireGuard, Kali
- **Libraries:** Pandas, Matplotlib, scikit-learn