

# Yifan Ni

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## EDUCATION

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### New York University - Tandon School of Engineering

*Master of Science in Computer Engineering*

**Brooklyn, NY**

*Sep.22 – May.24*

- ♦ Volunteers: Helped autism children host a gallery.
- ♦ Leadership: Arranged and assigned the team member for project's tasks.
- ♦ Side Project: Created an OBS in script python for better streaming experience. Built a voice AI module.
- ♦ Core Courses: Introduction to Java(Java, Swing), Machine Learning(Jupyter, Scipy, numpy), Data Structure and Algorithm

### University of Delaware

*Bachelor of Science in Computer Science*

**Newark, DE**

*Aug.17 – May.22*

- ♦ Leadership: Organized events with student council as a UDCSSA member; Covered Final Project member's tasks
- ♦ Side Project: Created a self-introduction website; Cracked an iOS software after unpacking;
- ♦ Core Courses: Data Structure(C++), Advanced Web Technologies(Javascript, npm), Secure Application Design(C, Python)

## PROFESSIONAL EXPERIENCE

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### State Grid Corporation

*Part-time Cybersecurity Engineer Assistant*

**Hefei, China**

*Jul.21 – Aug.21*

- ♦ Conducted a penetration test on the client company's backend server. Located the IP of the server by Nmap scanning. Wrote an automated Python program to brute force the root password.
- ♦ Gave clients advice about deploying network security measures, such as change the default root id, setting up captcha to block frequent access, and set up firewalls to block public network traffic.

## KEY ACADEMIC PROJECT

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### Texas Hold'em Game(Introduction to Java Final Project)

*Mar.23 – May.23*

- ♦ Created a client-server architecture Poker game with Swing in Java independently for final project.
- ♦ Designed the user interface and created game logic. Incorporated multithreading for handling multiple connections and game events. Designed the database schema and integrated it with the server.
- ♦ Conducted testing and addressed bug fixes and prepared the final documentation for submission.

### RISC-V Processor Simulator CSA Final Project

*Oct.22 – Dec.22*

- ♦ Designed a cycle-accurate 32-bit RISC-V processor simulator in Python with teammate. Fulfilled the project requirement of implementing the logic of both single stage and five-stage pipelined processor.
- ♦ Added controls to fulfill five-stage multithreading and managed data hazards.
- ♦ Tested with provided test cases and commented the code for readability for submission.

### Microbots UD Senior Design Program

*Sep.21 – Apr.22*

- ♦ Collaborated with Mechanical Engineering department to implement an image processing program to track the momentum of microbots(size in micron) from video/stream of the microscope.
- ♦ Used trackpy in Jupyter to implement the position tracking and the speed detection.
- ♦ Headed to robot lab weekly to present the progress and consulted with the robot lab team for developing needs.
- ♦ Presented a demo to the robot lab with tracking the microbots' momentum under certain resolution.
- ♦ Wrote a documentation for both the robot lab team members and new seniors to take over the project.

### Beatmaker (Advanced Web Technologies Group Design)

*Sep.21 – Dec.21*

- ♦ Achieved to build a website based on HTML5 to upload or select a set of sounds and create musical beat.
- ♦ Built the UI with bootstrap CSS and with Javascript on the backend.
- ♦ Deployed the project in the course's server for peer review.

## MISCELLANEOUS

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- ♦ Programming Language and skills: C, Python, Java, Javascript; XML HTML
- ♦ Being proficient in using search engines and LLM, MS Office.
- ♦ Bilingual in Chinese and English, Conversational in Japanese.
- ♦ Hobby: Watching MLB and Formula One.