**XIAOCHEN (NIGEL) LU**

New York, NY| Tel: +1 (845) 248-2938 **|** Email: [xiaoclu@outlook.com](mailto:xiaoclu@outlook.com) | Website: http://nigellu.com

Education

**New York University New York, NY**

**Master of Science in Computer Science May 2025**

* Cumulative GPA: 3.88/4.0; Coursework: *Algorithms, Computer Vision, Software Engineering*, *Network Security, Big Data*

**New York University New York, NY and Shanghai, China**

**Bachelor of Science,** Data Science, minor in Computer Science **May 2023**

* Cumulative GPA: 3.91/ 4.0; Magna Cum Laude; NYU Honors Scholar; Dean’s List for all Years
* Coursework: *Machine Learning, Deep Learning, NLP*, *Probability & Stats*, *Data Structures*, *Database, Econometrics*

Skills

* Technical Skills: **Python** (PyTorch, Django, Pandas, NumPy, SciPy), **High-performance/Distributed Computing**, **Java** (Srping Boot, multi-threading), **JavaScript** (TypeScript, React, Vue, ExpressJS), **CI/CD** (Travis + AWS), **SQL** (MySQL, PostgreSQL)

Research & Projects

**Few-shot Segmentation with Adaptive Data Augmentation and Cross Attention Shanghai, China**

Co-authored a paper and submitted to CVPR 2023 **Mar. 2022 - May 2023**

* Proposed an instance-aware data augmentation strategy to improve support image diversity and reduce distribution inconsistency between query and support images in low-data regimes, boosting model performance by 3.7% in ablation studies
* Incorporated a 4-D consensus cross attention module to align query and support features, increasing accuracy by 5.4%
* Wrote 1000+ lines of code to build a scalable PyTorch codebase for few-shot segmentation research, enabling easy backbone swaps

**Multimodal Online Student Engagement Dataset Abu Dhabi, UAE**

Co-authored a paper and published on **Nuclear Physics B** journal **May 2021 – Mar. 2022**

* Created a 17GB labeled engagement detection dataset of 300+ participants in online learning settings
* Investigated the correlation between post-class self-evaluation results and personality surveys to provide insights on how personality may relate to engagement level in online learning. Apply various significance tests (e.g., T-test) to verify the potential correlations
* Established a CNN-RNN hybrid baseline model to process spatial and temporal signals simultaneously

**Parkrowd NYC New York, NY**

Parking Made Easy - Crowd-sourced Parking Info Sharing Platform based off of NYC Open Data **Sept. 2023 – Dec. 2023**

* Conceptualized a parking info sharing platform by listing MVP, MLP, API documentations, and using Figma prototyping
* Implemented Parkrowd as a Django App with a team of 5 through Scrum and ZenHub (repo: <https://github.com/NigelLu/Parkrowd>)

Professional Experience

**eBay Inc. Shanghai, China**

Software Engineering Intern, Cloud Infrastructure Team **Sept. 2022 – Aug. 2023**

* **Averge-Time-to-Business (ATB) Dashboard**
* Proposed and implemented a Redux + React+Django Average-Time-to-Business (ATB) dashboard to monitor cluster statuses and send checkout alerts, reducing crisis response time by 25% and boosted service availability from 99.14% to 99.8%
* **KeyHub (Community’s Encrypted Email UI for Password Exchange)**
* Led the refactorization of KeyHub to conform with the latest OpenPGP standard and patched 60+ security vulnerabilities
* Integrated KeyHub with eBay’s Cloud Console using JS-plugin and Redux, boosting productivity of over 100 infra engineers

**Kaizntree Co. New York, NY and Remote**

Co-founder and CTO **Sept. 2021 – Present**

* **Kaizntree Small Business Management Platform**
* Built a one-stop management solution for small businesses using Vue, Django Rest Framework, PostgreSQL, and Heroku, empowering 100+ happy customers by reducing time spent on management tasks from 15 to just 2 hours per week
* 2-way integrated with 4 major sales channels using OAuth2, including Shopify, Square, Etsy, and Xerox, and automated stock sync across platforms, putting an end to the cumbersome manual updates and stock inconsistency on different channels
* Led Kaizntree’s development team and adopted Scrum, Travis CI/CD with Heroku to minimize friction, allowing Kaizntree to address customer feedbacks under 48 hours and continuously rolling out new features weekly
* **NYU Summer Launchpad & NYUxYale Startup Competition**
* Won the 2023 NYU Summer Launchpad and 2023 NYUxYale Startup Competition, receiving a $10,000 non-dilutive funding
* Currently applying for Y Combinator and Techstars (startup accelerators), under 1-on-1 mentorship from established entrepreneurs
* Earned investment from 3 individual investors and received a total of $50,000 investment with Kaizntree valued at 4 million

**Expsoft Ltd. Wuxi, China**

Software Engineering Intern **May 2021 – Sept. 2021**

* Leveraged the power of Springboot and Maven to build resilient and user-friendly auditing platforms for governments
* Secured a project from Soochow government worth $250,000 to supply customized audit platform