Teaching Statement

You (Neil) Zhang

My teaching philosophy is founded on **sparking interest and laying a solid foundation** for students. A keen interest in the subject and a strong understanding of the basics are pivotal for effective and meaningful learning.

Drawing from my experiences as a student, I have realized that the most enjoyable and effective learning occurs when the subject matter resonates with the student's interests and aspirations. As I became drawn to certain subjects, my curiosity and engagement naturally intensified. This led to active participation in class and a proactive approach to learning, often prompting questions during lectures. However, interest alone is not enough. Without a basic understanding of the necessary prerequisites, fully grasping new concepts can become challenging, and initial interest might wane gradually over time. Therefore, solid foundational knowledge is crucial. It enables students to absorb and build upon new concepts more effectively, reinforcing their interest and paving the way for deeper exploration and understanding.

As a teaching assistant for courses like Audio Signal Processing, The Art of Machine Learning, and Computer Audition, I have applied my teaching philosophy effectively. My focus has been on highlighting the practical applications to spark interest while simultaneously engaging students with fundamental concepts.

Given the practical nature of computer audition and machine learning, demonstrating its real-world applications is crucial for sparking student interest. I have curated assignments that directly reflect such applications. For instance, one assignment for the machine learning course involves using convolutional neural networks to detect COVID-19 from lung ultrasound videos automatically. Another assignment for the computer audition course focuses on speaker verification and diarization, where students develop models to determine the speaker's identity and speaking times in recordings. By integrating real-world applications into homework assignments, students practice the concepts learned and gain confidence in their ability to address real-world challenges. Ensuring students have a solid grasp of these concepts is also my priority. During office hours, I often reiterate and clarify key ideas, ensuring students understand the material essential for tackling homework problems.

Moreover, my teaching approach also involves designing and delivering guest lectures on specialized topics. In my lectures on *Python Programming for Audio* and *Neural Network Training*, I guide students through fundamental concepts and code elements essential for implementing discussed algorithms throughout the course. In my guest lecture on *Speech Technology*, I lead students through various real-world applications of speech analysis, complementing other lectures primarily focused on music analysis methods and algorithms. In my teaching, I strive to provide a blend of theoretical instruction and hands-on application, ensuring comprehensive understanding and practical competence among students.

Acknowledging the wide spectrum of learning styles and backgrounds among students, my dedication lies in fostering an inclusive and supportive educational environment. The diversity in my classroom is notable, with students not only from the Electrical and Computer Engineering (ECE) department but also from fields as varied as Physics and Neuroscience. Recognizing that some students may not possess strong programming skills or a foundational understanding of signal processing, I devote additional time and resources to guide these students through the basics. This ensures they gain the confidence and competence needed to tackle more advanced aspects of the course effectively.

The effectiveness of my teaching approach is clearly reflected in the positive feedback I have received in course evaluations and student testimonials. This is quantified in an impressive average overall rating of 4.63 out of 5 for my performance as a teaching assistant, as recorded in the AEFIS evaluation system. Further reinforcement of my teaching style comes from supporting letters by students like Haixi Zhang from The Art of Machine Learning course and Yutong Wen from the Computer Audition course. These acknowledgments reflect my effectiveness in imparting foundational knowledge and inspiring students, fostering curiosity, and facilitating a deeper understanding of the subject matter.

I am consistent in my teaching philosophy as applied to the mentorship of undergraduate and graduate students in research. Typically, a student approaches me with a budding research interest, which ideally resonates with my own academic pursuits. In such cases, we work together to design a project scope that reflects our shared interests. My role is to guide them through the research process, from designing experiments to analyzing results and adjusting the research direction as necessary. When working with undergraduate students in their first research experiences, my strategy involves an initial discussion about my interesting projects, providing them with hands-on experience tackling fundamental research challenges. Through iterative discussions, we collaboratively develop and refine a research idea to pursue together.

The success of my methodology in research mentorship is evident in the contributed publications that have resulted from these projects. My approach has proven effective for students, as reflected in the appreciative letters and emails from students like Enting Zhou, Yutong Wen and Yongyi Zang. These documents highlight the impact of my guidance on their research endeavors and underscore the value of a mentorship style that is inspiring.

In summary, my teaching philosophy is about sparking students' interest and providing them with a strong foundational understanding, thereby facilitating not just learning but a lifelong passion and curiosity. I believe my approach in teaching will not only benefit the students academically but also prepares them for diverse career paths, whether in the job market, other fields of interest, or in research contributions.

Summary of Teaching Impact

You (Neil) Zhang

This document comprehensively overviews the impact of my teaching and mentorship over recent years. It encapsulates a detailed record of my involvement in classroom teaching across various courses and my active participation in guiding students through their research projects. The positive impact of my teaching is reflected in the feedback and evaluations I have received from students. This summary includes course evaluation reports from AEFIS, highlighting student responses to my teaching methodologies. Furthermore, personal student testimonials in letters and emails attest to my mentorship's effectiveness and influence in academic and research settings. These materials demonstrate my dedication to educational excellence and creating a nurturing and intellectually stimulating student environment.

Comprehensive Teaching and Mentorship Record

Over the past years, my teaching and mentorship roles have included a variety of responsibilities and accomplishments. In the classroom, I have made significant contributions to 5 courses for 8 semesters in the Department of Electrical and Computer Engineering (ECE), including ECE 277/477, ECE 208/408, ECE 440, ECE 272/472, ECE 216. My responsibilities included giving guest lectures on specialized topics, grading assignments, and holding office hours. I have given 7 guest lectures on Python programming for audio, speech technology, neural network training, and some machine learning concepts. I also have designed 5 challenging homework assignments to enhance student learning. My dedication and effectiveness in these roles are reflected in the average overall rating of 4.63 for my teaching assistant performance, as per the AEFIS evaluation system. This rating, derived from student feedback, underscores my commitment to delivering high-quality education and my ability to impact students' academic journeys positively.

In addition to classroom teaching, I have actively participated in mentoring students in their research endeavors. My mentees include 4 undergraduate students and 3 graduate students from diverse disciplines such as Computer Science, Audio and Music Engineering, and Data Science. Notably, three of these students belong to underrepresented groups, reflecting my commitment to diversity and inclusion in academic research. They have worked on highly relevant projects in today's tech-driven world, such as Audio-Visual Deepfake Detection, HRTF Personalization, and Speech Emotion Representation Learning. The research experience provided to these students has been a valuable educational opportunity for them and has led to substantial academic achievements. Their efforts have resulted in 9 publications at prestigious conferences, highlighting the impactful nature of our collaborative research endeavors. These conferences include the IEEE International Conference on Acoustics, Speech and Signal Processing (ICASSP), the IEEE Workshop on Applications of Signal Processing to Audio and Acoustics (WASPAA), and Interspeech, renowned platforms in the field. Remarkably, 8 of these

publications feature the mentees as the first or co-first author, a testament to their significant role in the research and the success of the mentorship process.

The synergy of my teaching in the classroom and active mentorship in research endeavors demonstrates my commitment to creating a comprehensive, research-driven learning environment that will nurture the next generation of innovators in ECE.

Classroom teaching

Spring 2024: ECE 411 - Selected Topics in Augmented and Virtual Reality (Instructors: Mujdat Cetin, Zhiyao Duan, Jannick Rolland, Daniel Nikolov)
- Working with Prof. Duan on the module of Acoustic Rendering and Computer Audition. The responsibilities include designing and grading programming homework assignments and holding office hours.

Fall 2023: ECE 277/477 - Computer Audition (Instructor: Zhiyao Duan)
- Guest lectures
  - Delivered a lecture on "Python Programming for Audio."
  - Delivered a lecture on "Speech Technology."
  - Delivered a lecture on "Speech Anti-Spoofing."
- Independently designed a new homework assignment.
  - HW6: Speaker Verification and Diarization. This assignment is designed to give students practical experience with speech technology. They engage in programming with deep learning techniques to develop a speaker recognition model, extracting distinct speaker characteristic representations from speech. Students then apply these representations to perform verification and diarization.
- Graded homework assignments and held regular office hours.

Spring 2023: ECE 208/408 - The Art of Machine Learning (Instructor: Zhiyao Duan)
- Guest lectures
  - Delivered a lecture on "Support Vector Machines (SVM)".
  - Delivered a lecture on "Neural Network Training".
- Co-designed four new homework assignments, all of them involving programming. I prepared the initial drafts, followed by Professor Duan's review and revisions.
  - HW2: Data Analysis with Machine Learning Pipeline. This assignment focuses on implementing a machine learning pipeline for data analysis, incorporating algorithms like nearest neighbor and decision trees.
  - HW3: Binary Classification Problems. This assignment centers on solving classification problems using the Perceptron algorithm and logistic regression.
  - HW4: Multi-Class Classification and Regression. This assignment involves students in multi-class classification and regression tasks using both toy data and real-world scenarios, including wine quality prediction.
  - HW6: Deep Learning and Real-World Application. This assignment engages students with deep learning multi-layer perceptron (MLP) using CIFAR-10 data

and addressing a real-world application for automatically detecting COVID-19 from lung ultrasound video data.
- Graded homework assignments and held regular office hours.

Fall 2022: ECE 440 - Introduction to Random Processes (Instructor: Gonzalo Mateos)
- Grade homework assignments and held regular office hours.

Spring 2022: ECE 208/408 - The Art of Machine Learning (Instructor: Andrea Cogliati)
- Guest lectures
  - Delivered a lecture on "Generative Adversarial Networks (GAN)."
- Designed one homework question about Principal Component Analysis (PCA) vs. Fast Fourier Transform (FFT) for the assignment on dimensionality reduction.
- Led several lab sessions to guide students through the code notebooks accompanying the course textbook, providing hands-on experience and practical understanding.
- Graded homework assignments and held regular office hours.

Spring 2021: ECE 272/472 - Audio Signal Processing (Instructor: Sarah Rose Smith)
- Led weekly recitations during the first half of the semester.
- Graded homework assignments and held regular office hours.

Fall 2020: ECE 277/477 - Computer Audition (Instructor: Andrea Cogliati)
- Guest lectures
  - Delivered a lecture on "Introduction to Speech Technology."
- Graded homework assignments and held regular office hours.

Spring 2020: ECE 272/472 - Audio Signal Processing (Instructor: Zhiyao Duan)
- Designed a homework question on reverberation time prediction for assignments focusing on Machine Learning for Audio.
- Graded homework assignments and held regular office hours.

Fall 2019: ECE 216 - Microprocessor & Data Conversion (Instructor: Thomas Howard)
- Led biweekly lab sessions, guiding students through lab assignments.
- Graded laboratory assignments and held regular office hours.

Students Mentored on Research

Kyungbok Lee
- Program: Computer Science (CS) Undergraduate at University of Rochester (UR)
- Time: Fall 2023 - Present
- Project: Audio-Visual Deepfake Detection
- Description: This project focuses on identifying and analyzing deepfake content within videos, addressing the growing challenges posed by advanced deepfake technology. Specifically, it aims to discern whether a video includes AI-generated elements, such as synthesized audio or altered visual content.

Yutong Wen
- ● Program: Audio and Music Engineering (AME) Undergraduate at University of Rochester (UR)
- ● Time: Spring 2023 - Present
- ● Project: HRTF Personalization with Neural Fields
- ● Description: We tackle the challenge of learning a unified HRTF (Head-Related Transfer Function) representation across multiple databases for personalizing spatial audio. We identify the causes of cross-database differences and propose a novel approach to normalize the frequency responses of HRTFs across databases.
- ● Outcome: One first-authored conference paper:
Wen, Yutong, You Zhang, and Zhiyao Duan. "Mitigating Cross-Database Differences for Learning Unified HRTF Representation." *2023 IEEE Workshop on Applications of Signal Processing to Audio and Acoustics (WASPAA)*. IEEE, 2023.
Yutong received a 2023 University of Rochester Undergraduate Research Presentation Award and a WASPAA travel grant with this work.

Enting Zhou
- ● Program: Computer Science (CS) Undergraduate at University of Rochester (UR)
- ● Time: Spring 2023 - Summer 2023
- ● Project: Speech Emotion Representation Learning
- ● Description: Dimensional representations of speech emotions, such as the arousal-valence (AV) representation, provide a continuous and fine-grained description and control than their categorical counterparts. We propose to take advantage of pre-trained large speech models and human prior knowledge in psychology from sparse categorical emotion labels for predicting dimensional emotion representation.
- ● Outcome: One first-authored conference paper:
Zhou, Enting, You Zhang, and Zhiyao Duan. "Learning Arousal-Valence Representation from Categorical Emotion Labels of Speech." *ICASSP 2024-2024 IEEE International Conference on Acoustics, Speech and Signal Processing (ICASSP)*. IEEE, 2024.

Yongyi Zang
- ● Program: Audio and Music Engineering (AME) Undergraduate at University of Rochester (UR)
- ● Time: Fall 2022 - Summer 2023
- ● Project: Audio Deepfake Detection
- ● Description: In the first project, we aim to enhance the detection of audio deepfakes, especially in unfamiliar channels like new audio codecs and devices. We focus on analyzing and implementing phase perturbation to improve the robustness of detection across various channels. The second project involves creating a dataset of both deepfake and authentic singing samples, addressing the rise of singing voice deepfake on video platforms. We developed detection models to differentiate between real and synthesized singing voices.
- ● Outcome: One first-authored conference paper and one co-first-authored conference paper:

- ○ Zang, Yongyi, You Zhang, and Zhiyao Duan. "Phase Perturbation Improves Channel Robustness for Speech Spoofing Countermeasures." *Interspeech*, 2023.
- ○ Zang, Yongyi, et al. "SingFake: Singing Voice Deepfake Detection." *ICASSP 2024-2024 IEEE International Conference on Acoustics, Speech and Signal Processing (ICASSP)*. IEEE, 2024.

Siwen Ding
- Program: Data Science (DS) Master's at Columbia University
- Time: Summer 2023
- Project: Audio Deepfake Detection
- Description: Building upon my prior research in "one-class learning" for audio deepfake detection, this project introduces a novel approach to enhance model generalization against unseen spoofing attacks. We developed a multi-center one-class learning method that leverages speaker information to define centers in the embedding space.
- Outcome: One first-authored conference paper:
  Ding, Siwen, You Zhang, and Zhiyao Duan. "SAMO: Speaker Attractor Multi-Center One-Class Learning For Voice Anti-Spoofing." *ICASSP 2023-2023 IEEE International Conference on Acoustics, Speech and Signal Processing (ICASSP)*. IEEE, 2023.

Abudukelimu Wuerkaixi
- Program: Junior PhD Student at Tsinghua University
- Time: Fall 2021 - Spring 2022
- Project: Audio-Visual Speaker Diarization
- Description: Our objective is to address the challenge of audio-visual diarization, which involves identifying who is speaking and at what time in a video. The first part of the project tackles unsynchronized scenarios, identifying instances where the visible speaker is not the one speaking. The second part of the project adopts a novel approach by utilizing visual information to guide speaker embedding rather than merging audio and visual information. This strategy is particularly effective in situations involving off-screen speakers, where the person speaking is not present in the video frame.
- Outcome: Two first-authored conference papers:
  - ○ Wuerkaixi, Abudukelimu, et al. "Rethinking Audio-Visual Synchronization for Active Speaker Detection," *2022 IEEE 32nd International Workshop on Machine Learning for Signal Processing (MLSP)*. IEEE, 2022.
  - ○ Wuerkaixi, Abudukelimu, et al. "DyViSE: Dynamic Vision-Guided Speaker Embedding for Audio-Visual Speaker Diarization." *2022 IEEE 24th International Workshop on Multimedia Signal Processing (MMSP)*. IEEE, 2022.

Xinhui Chen
- Program: Computer Science (CS) Master's at University of Rochester (UR)
- Time: Spring 2021 - Summer 2021
- Project: Audio Deepfake Detection
- Description: This project builds on our earlier research that focused on enhancing channel robustness in audio deepfake detection systems through channel robust training strategies. We applied these findings to participate in the ASVspoof 2021 challenge,

testing the efficacy of our methods in a challenging scenario. The insights and outcomes gleaned from this challenge have been further utilized in authoring a chapter for a handbook, detailing our methods and findings in advancing voice spoofing detection.

- Outcome: One co-first-authored conference paper and one co-authored book chapter:
  - Chen, Xinhui, et al. "UR channel-robust synthetic speech detection system for ASVspoof 2021." *ASVspoof 2021 Workshop,* 2021.
  - Zhang, You, et al. "Generalizing Voice Presentation Attack Detection to Unseen Synthetic Attacks and Channel Variation." *Handbook of Biometric Anti-Spoofing: Presentation Attack Detection and Vulnerability Assessment.* Singapore: Springer Nature Singapore, 2023. 421-443.

Teaching evaluations

This section offers a detailed overview of the evaluations and feedback I have received in my teaching and mentorship roles. Included are course evaluations from AEFIS that highlight student feedback from various classes. It's important to note that some courses might not have generated full reports due to a smaller number of student evaluations. Additionally, this section contains personal testimonies to my teaching effectiveness and mentorship impact. These include a letter of support from Haixi Zhang, an undergraduate who participated in ECE 208/408 - The Art of Machine Learning during Spring 2023, and a letter from Yutong Wen, who was both a student in ECE 477 - Computer Audition in Fall 2023 and a research mentee. Also included are thank-you emails from Yongyi Zang and Yutong Wen, acknowledging the guidance and support they received in their research endeavors under my mentorship. Lastly, a letter from Enting Zhou, another research mentee, reflects on the mentorship experience. These documents collectively show my dedication and effectiveness as an educator and mentor, underlining my commitment to fostering a nurturing and enriching academic environment.

Below is a catalog of evaluative materials, with supplementary materials attached for further reference:

- Course Evaluations from AEFIS: These evaluations provide student feedback on various courses. It should be noted that some courses, due to limited student evaluations, may not have complete reports available.
- Letter from Haixi Zhang: This letter is from an undergraduate student who enrolled in ECE 208/408 - The Art of Machine Learning in Spring 2023.
- Letter from Yutong Wen: Yutong Wen, an undergraduate student in ECE 477 - Computer Audition in Fall 2023, also mentored by me in research, has provided a letter detailing this experience.
- Thank-You Emails: These are from Yongyi Zang and Yutong Wen, both of whom I mentored in their research projects.
- Letter from Enting Zhou: This letter is from a research mentee, reflecting on the mentorship provided.

These materials collectively offer insight into my teaching style and effectiveness, as well as my ability to guide and inspire students in both classroom and research settings.

Support Letter for Teaching Assistant Neil Zhang

Dear Committee Members,

I hope this letter finds you well. I am writing to express my strong support for Neil Zhang, the teaching assistant for the ECE 208/408 course on the art of machine learning, which I attended during the spring of 2023.

Throughout the course, Neil played a pivotal role in enhancing our learning experience through his dedication and expertise. I would like to highlight four key aspects where Neil's support significantly contributed to my academic growth.

Firstly, Neil's weekly office hours were instrumental in providing detailed assistance with Python coding and mathematical proofs for writing algorithms. I attended several sessions seeking clarification on homework and other out of class topics, and Neil consistently offered insightful answers, constructive feedback, and guided me to approach problems more strategically.

Secondly, Neil's provision of skeleton code for homework assignments proved invaluable. Each of the eight homework assignments, each containing at least 5 questions with numerous sub questions, would have been much more complex without his clever hints. His well-commented skeleton code served as a guide, offering crucial hints, and facilitating a smoother problem-solving process. His approach enabled me to think in the right direction and discover more efficient solutions.

Thirdly, Neil's lecture on Basic Neural Networks and training techniques was informative and well-delivered. The clear and intuitive lecture notes, coupled with practical examples, greatly aided my understanding. His willingness to address questions and make lecture materials accessible to everyone demonstrated his commitment to our learning.

Lastly, Neil's contributions during the final project proposal and presentation discussions were commendable. This course contains a final project and expect students to work in a group, to apply machine learning techniques to solve an application problem. Neil spent an entire day providing suggestions for each group's project after listening to their presentations. His insightful suggestions significantly improved our project's performance, leading to a 40% enhancement. Inspired by his guidance, I refined the project into a research paper currently under review by a conference.

In conclusion, I am immensely satisfied with the course, and Neil's assistance played a crucial role in deepening my understanding of machine learning. His academic prowess, inclusivity, and patience make him an exceptional teaching assistant. I wholeheartedly endorse Neil Zhang and believe that his continued contributions will positively impact future students.

Sincerely,
Haixi Zhang
Electrical and Computer Engineering | Statistics
University of Rochester, 2024

Teaching Supporting Letter

I am pleased to write this essay to wholeheartedly endorse Neil as a truly exceptional mentor. Beyond demonstrating extraordinary teaching skills, Neilhas profoundly impacted students through his boundless passion, innovative approach, and unwavering dedication to education.

My journey with Neil commenced last year when I joined the Personalized Head Related Transfer Function Modeling project under his leadership. At that juncture, I lacked research experience and was unfamiliar with deep learning in the audio domain. The challenges ahead seemed daunting. It was through Neil's adept teaching skills and meticulous guidance that I found my footing swiftly. Recognizing my initial unfamiliarity with the project, Neil initiated my learning process by tasking me with understanding his previous works. He reminded me that there would be terminologies and concepts that I didn't know, and he asked not to worry about the details of those at that stage. He tactfully alleviated my concerns about potential complexities, urging me to focus on grasping the broader concepts. This thoughtful approach eased my entry into the realm of audio deep learning research. Neil's mentorship extended beyond conventional teaching. He set up meetings to discuss relevant papers, encouraging me to ask questions about unfamiliar concepts and thoughts on our project, so that I learned to think on my own about this project. During the meeting, he explained to me about these concepts in detail, and gave me examples and applications of them in the actual research projects. For example, he demonstrated how auto-deconders work and its connection to auto-encoders. His methodical explanations not only clarified individual concepts but also illustrated their connections and practical applications. Under Neil's guidance, I quickly found the rhythm of research, developing a profound engagement with our project. This effective learning methodology has since become a cornerstone for my approach to other projects.

Apart from teaching prowess, Neil's mentorship includes invaluable advice. In the research project, it is important to design good experiments to demonstrate the effectiveness of our proposed methods. Unlike doing homework where I only need to follow the instructions, there could be numerous ways to design an experiment. The ones I designed, often, failed to cover a wide range of attributes that we wanted to show. Neil always gave me suggestions on improving the experiments. He offered with compelling reasons, and pushed me further to think for better designs. For instance, in the experiment, I designed to differentiate the HRTFs on a single location basis, but Neil pointed out that a set of HRTFs of multiple locations could also provide cues in HRTF differentiation, and therefore he suggested we base on twelve common locations together. In writing the paper and practicing presentation, Neil continuously commented on the drafts to make our work better presented to the academic community. With his comments, I understood that doing a good project itself was not enough. Effectively presenting the work to others urging meaningful discussions was as significant as doing good research itself. Neil pushed me to practice my presentation skills, so that I could demonstrate my ideas to other scholars more effectively. As my mentor, Neil's advice and research philosophy not only make our work better, but also teach me the right way to do research.

In the Computer Audition course, Neil taught us Python and speaker diarization. His class was well arranged, and slides were carefully designed. Since the students' Python level was uneven, Neil started from basic Python operators and arithmetics, and gradually advanced to basic deep neural network training pipelines. He also designed one homework for this course. The task was to do speaker diarization. Neil provided us with a template, and the problems tested our basic understanding of speaker diarization. The last few questions asked students to implement some library functions, which required some thoughts and designs from students. Neil deliberately designed some stretch questions in the homework to fit students of various abilities better.

Being mentored by Neil, I witnessed his creativity, critical thinking, and rigorous attitude in doing research. For numerous times, I thought my way of experiment design, writing, making slides, and presenting was good enough, Neil always comments something better. From Neil, I know the good qualities that a researcher and teacher possesses. Neil is more than an educator; he is a beacon of inspiration, motivating students to strive for excellence. I am confident that his teaching philosophy, passion, and dedication make him an invaluable asset to any educational institution. I wholeheartedly recommend Neil for his exceptional teaching qualities, and I am certain that he will continue to positively impact the lives of students in the future.

Yutong Wen

RE: Story about Neil

Yongyi Zang <yzang4@u.rochester.edu>

Thu 11/9/2023 5:48 PM

To:Duan, Zhiyao <zhiyao.duan@rochester.edu>;Benetatos, Christodoulos <cbenetat@UR.Rochester.edu>;Chen, Melissa <meiying.chen@rochester.edu>;Cwitkowitz, Frank <fcwitkow@ur.rochester.edu>;Darefsky, Jordan <jdarefsk@u.Rochester.edu>;Ji, Yueyin <yji12@Simon.rochester.edu>;Lee, Kyungbok <klee109@u.Rochester.edu>;Li, Zehua <zli142@UR.Rochester.edu>;Wang, Yiyang <ywang418@UR.Rochester.edu>;Wen, Yutong <ywen6@u.Rochester.edu>;Yan, Yujia <yyan22@ur.rochester.edu>;Yang, Qiaoyu <qyang15@ur.rochester.edu>;Yu, Huiran <hyu56@UR.Rochester.edu>;Zhang, Neil <yzh298@ur.rochester.edu>;Zhang, Tianyi <tzhang51@u.Rochester.edu>;Zhong, Yi <yzhong18@UR.Rochester.edu>;Zhu, Ge <gzhu6@ur.rochester.edu>;Heydari, Mojtaba <mheydari@ur.rochester.edu>

Hi all,

Congrats to Neil! I almost want to custom make a "Audio Deepfake Detective" banner (red background, bold golden text) and gift it to Neil hhhhh

Jokes aside, this is great! I'm incredibly thankful to Neil for helping me with the first projects, and I sincerely hope Neil achieves more success in his future endeavors!

Best,
Yongyi

On Nov 9, 2023 at 2:39 PM -0800, Heydari, Mojtaba <mheydari@ur.rochester.edu>, wrote:

> Hoooray!
>
> A big shout out to Neil for achieving such an achievement! Congrats, Neil and good luck with the rest of your project buddy!
>
> Cheers,
> Moji
>
>
>
>
> -------- Original message --------
> From: "Duan, Zhiyao" <zhiyao.duan@rochester.edu>
> Date: 11/9/23 5:15 PM (GMT-05:00)
> To: "Benetatos, Christodoulos" <cbenetat@UR.Rochester.edu>, "Chen, Melissa" <meiying.chen@rochester.edu>, "Cwitkowitz, Frank" <fcwitkow@ur.rochester.edu>, "Darefsky, Jordan" <jdarefsk@u.Rochester.edu>, "Heydari, Mojtaba" <mheydari@ur.rochester.edu>, "Ji, Yueyin" <yji12@Simon.rochester.edu>, "Lee, Kyungbok" <klee109@u.Rochester.edu>, "Li, Zehua" <zli142@UR.Rochester.edu>, "Wang, Yiyang" <ywang418@UR.Rochester.edu>, "Wen, Yutong" <ywen6@u.Rochester.edu>, "Yan, Yujia" <yyan22@ur.rochester.edu>, "Yang, Qiaoyu" <qyang15@ur.rochester.edu>, "Yu, Huiran" <hyu56@UR.Rochester.edu>, "Zang, Yongyi" <yzang4@u.Rochester.edu>, "Zhang, Neil" <yzh298@ur.rochester.edu>, "Zhang, Tianyi" <tzhang51@u.Rochester.edu>, "Zhong, Yi" <yzhong18@UR.Rochester.edu>, "Zhu, Ge" <gzhu6@ur.rochester.edu>
> Subject: Story about Neil
>
> Hi everyone,
> Check out this handsome guy!
> https://www.rochester.edu/newscenter/audio-deepfake-detective-developing-new-sleuthing-techniques-573482/

Cheers,
Zhiyao

Zhiyao Duan
Associate Professor
Department of Electrical and Computer Engineering
University of Rochester
720 Computer Studies Building
Rochester, NY 14627
585-275-5302
http://www.ece.rochester.edu/~zduan/

Re: Congratulations to Yongyi and Yutong

Zhang, Neil <yzh298@ur.rochester.edu>
Thu 7/13/2023 1:36 PM

To:Wen, Yutong <ywen6@u.Rochester.edu>;Zang, Yongyi <yzang4@u.Rochester.edu>
Cc:Benetatos, Christodoulos <cbenetat@UR.Rochester.edu>;Chen, Jiajun <jchen192@u.rochester.edu>;Chen, Melissa <meiying.chen@rochester.edu>;Cwitkowitz, Frank <fcwitkow@ur.rochester.edu>;Darefsky, Jordan <jdarefsk@u.Rochester.edu>;Duan, Zhiyao <zhiyao.duan@rochester.edu>;Heydari, Mojtaba <mheydari@ur.rochester.edu>;Li, Zehua <zli142@UR.Rochester.edu>;Wang, Yiyang <ywang418@UR.Rochester.edu>;
Yan, Yujia <yyan22@ur.rochester.edu>;Yang, Qiaoyu <qyang15@ur.rochester.edu>;Zhang, Tianyi <tzhang51@u.Rochester.edu>;Zhu, Ge <gzhu6@ur.rochester.edu>

Congrats, Yutong ang Yongyi! I am super proud of you!
Being able to mentor such talented and enthusiastic individuals in my research journey has been an absolute fortune for me. I truly appreciate your hard work and dedication, and I'm glad to see it all pay off.
I hope everything goes smoothly for you at the upcoming conferences.
Thanks to Professor Duan for all the kind support!

Best,
Neil

From: Yutong Wen <ywen6@u.rochester.edu>
Sent: Thursday, July 13, 2023 9:58 AM
To: Zang, Yongyi <yzang4@u.Rochester.edu>
Cc: Benetatos, Christodoulos <cbenetat@UR.Rochester.edu>; Chen, Jiajun <jchen192@u.rochester.edu>; Chen, Melissa <meiying.chen@rochester.edu>; Cwitkowitz, Frank <fcwitkow@ur.rochester.edu>; Darefsky, Jordan <jdarefsk@u.Rochester.edu>; Duan, Zhiyao <zhiyao.duan@rochester.edu>; Heydari, Mojtaba <mheydari@ur.rochester.edu>; Li, Zehua <zli142@UR.Rochester.edu>; Wang, Yiyang <ywang418@UR.Rochester.edu>; Yan, Yujia <yyan22@ur.rochester.edu>; Yang, Qiaoyu <qyang15@ur.rochester.edu>; Zhang, Neil <yzh298@ur.rochester.edu>; Zhang, Tianyi <tzhang51@u.Rochester.edu>; Zhu, Ge <gzhu6@ur.rochester.edu>
Subject: Re: Congratulations to Yongyi and Yutong

Hi all,

Thanks Professor Duan and Neil for your guidance and support! Also thanks Ge for helping me on the current project. I'm very grateful to have the opportunity to work with all of you. I learned a lot through this journey.

Best,
Yutong

On Thu, Jul 13, 2023 at 12:47 AM Yongyi Zang <yzang4@u.rochester.edu> wrote:
> Hi all,
>
> Thanks Prof. Duan for the kind words, and thank everyone for all your support during the last two years, especially Christos, Neil, Ge, Melissa and Frank! I feel forever grateful as an undergrad to have the opportunity of working alongside so many talented, passionate and professional people, and for having Prof. Duan's almost unconditional support on whatever topic I decided to explore. It has been a wonderful journey!
>
> Best,
> Yongyi

On Jul 12, 2023 at 9:29 PM -0700, Duan, Zhiyao <zhiyao.duan@rochester.edu>, wrote:

> Hi everyone,
>
> Yongyi and Yutong recently published their first papers as the first author! Yongyi's paper goes to Interspeech 2023 and Yutong's paper goes to WASPAA 2023. Both are very good conferences in our field.
> Publishing a paper as the first author as an undergraduate student is a great achievement, and I'm very proud of them. Both projects have been mentored by Neil. I'm sure he is proud too!
>
> Yongyi has also been mentored by and collaborated with Christos, Ge and Frank. Yutong has also been mentored by Ge. I'm happy that our PhD students have passion in mentoring undergrad and master's students!
>
> Congratulations to Yongyi and Yutong!
> Zhiyao
> --------
> Zhiyao Duan
> Associate Professor
> Department of Electrical and Computer Engineering
> University of Rochester
> 720 Computer Studies Building
> Rochester, NY 14627
> 585-275-5302
> http://www.ece.rochester.edu/~zduan/

Dear Evaluation Committee,

It is my delight to write this letter to support You(Neil) Zhang for the nomination of Edward Peck Curtis Award in Teaching. My name is Enting Zhou, and I am currently a graduate student at University of California, San Diego and a recent graduate from University of Rochester. I came to know Neil during my senior independent project at the University of Rochester Air Lab under the supervision of Professor Zhiyao Duan. I worked closely with Neil on our research project on speech emotion recognition. In our interaction, he only showcased his exemplary skills as a researcher but also his outstanding mentorship qualities.

Neil's dedication to research is truly remarkable, consistently setting a high standard for me to emulate. One example of his dedication is his approach to keep abreast of the latest developments in our field. His regular updates on recent preprints played a key role in our weekly meetings, where he led discussions that critically examined these papers, and we explored how these innovative insights could enhance our own research. This approach not only challenged me to develop a critical perspective on existing research but also helped in shaping a robust framework for conducting research. Furthermore, these discussions also helped our project align with the state-of-the-art research and in turn strengthen our paper's quality in the experimentation section for its comprehensive and rigorous comparison with recent state-of-the-art methods, which was highly praised by one of the reviewers. This is instrumental in our work's recent acceptance to the International Conference on Acoustics, Speech, and Signal Processing(ICASSP) 2024, which marks a personal milestone for my academic journey and a testament to Neil's mentorship ability.

Moreover, Neil's mentorship extended beyond academic guidance. His valuable career advice was a testament to his dedication to my professional growth. When applying for graduate school, Neil generously offered his time to help me research professors working in our field at the schools I was applying to. He used his own insights into their work to help me craft effective connection communications with these researchers. Neil also generously helped me restructure my personal statement. His input transformed my statement from a mere listing of facts to a compelling narrative that effectively linked my experiences, career goals, and the program I was applying to. The revised statement and the connection emails were crucial in helping me secure admission to the competitive Master of Science program in the ECE department at the University of California, San Diego, a significant milestone in my career development and reflects Neil's dedication to mentorship.

I believe Neil's dedication to research and mentorship have profoundly impacted my academic journey and professional development. His ability to inspire and guide others is exemplary. For these reasons, I believe he is highly qualified for the Edward Peck Curtis Award, and I am confident that he will continue to make significant contributions to the field of science and education of undergraduate students.

Sincerely,
Enting Zhou

Enting Zhou

01-24-2024