

# Meric Altug Gemalmaz

[🔗 gemalmaz.org](https://gemalmaz.org) [🌐 linkedin.com/in/meric-altug-gemalmaz](https://www.linkedin.com/in/meric-altug-gemalmaz) [✉ mgemalma@purdue.edu](mailto:mgemalma@purdue.edu)

## PROFESSIONAL SUMMARY

---

Highly motivated Ph.D. candidate in Computer Science with a focus on human-AI interaction, applied artificial intelligence, and fairness. Demonstrated history of published research in prestigious conferences, coupled with a strong graduate teaching experience. Proven skills in developing and executing studies that yield significant findings on artificial intelligence based fairness issues. Adept at leveraging advanced data analysis to understand and model complex problems.

## EDUCATION

---

- |   |  |
|---|--|
| <b>Purdue University</b><br><i>Ph.D. in Computer Science</i> <ul style="list-style-type: none"><li>• Advisor: Ming Yin</li><li>• GPA: 3.96/4.0.</li><li>• Committee: Chris Clifton, Dan Goldwasser, Sooyeon Jeong</li></ul>                 | West Lafayette, IN, USA<br>Jan. 2020 – Present   |
| <b>Purdue University</b><br><i>M.S. in Computer Science (Transferred to Ph.D. before Masters completion)</i> <ul style="list-style-type: none"><li>• GPA: 3.93/4.0.</li></ul>   | West Lafayette, IN, USA<br>Jan. 2019 – Dec. 2019 |
| <b>Purdue University</b><br><i>B.S. in Computer Science, Software Engineering Concentration</i> <ul style="list-style-type: none"><li>• GPA: 3.92/4.0. Graduated With Distinction. Dean's List and Semester Honors (8 Semesters).</li></ul> | West Lafayette, IN, USA<br>Aug. 2015 – Dec. 2018 |

## HONORS AND AWARDS

---

- |   |      |
|---|------|
| <b>The Graduate Teaching Award</b><br><i>Purdue University</i> <ul style="list-style-type: none"><li>• Recognized for exceptional teaching and leadership in graduate level Data Mining course. Awarded based on positive feedback from faculty and students, highlighting approachability, support, and ability to clarify complex concepts.</li></ul> | 2022 |
| <b>Raymond Boyce Graduate Teaching Award</b><br><i>Purdue University</i> <ul style="list-style-type: none"><li>• Awarded for outstanding teaching contributions to the undergraduate Computer Architecture class. Had the honor of recognition on a permanent plaque in the Lawson Computer Science Building.</li></ul>                                 | 2020 |

## TEACHING EXPERIENCE

---

### GRADUATE TEACHING ASSISTANT

**JAN. 2019 – DEC. 2021**

- |   |  |
|---|--|
| <b>Systems Programming (CS 25200)</b><br><i>Purdue University</i> <ul style="list-style-type: none"><li>• Led approximately two lab sections of 20 students each semester, mentored undergraduate TAs, and delivered a guest lecture in Spring 2019.</li><li>• Managed academic integrity and administrative tasks, while assisting students during office hours and via Piazza.</li><li>• <b>Evaluations:</b> Spring 2019 - Lab 1: <b>4.9/5.0</b>, Lab 2: <b>4.8/5.0</b>; Spring 2021 - Lab 1: <b>4.7/5.0</b>, Lab 2: <b>4.3/5.0</b>, Lab 3: <b>4.5/5.0</b></li></ul>  | Spring 2019, Spring 2020, Fall 2020, Spring 2021 |
| <b>Computer Architecture (CS 25000)</b><br><i>Purdue University</i> <ul style="list-style-type: none"><li>• Guided around two lab sections with 20 students each semester, advising roughly three undergraduate TAs.</li><li>• Worked across both sections offered by Dr. George B. Adams, III and Dr. Gustavo Rodriguez-Rivera in Fall 2019, adapting to both course structure. This adaptability contributed to earning the Raymond Boyce Graduate Teaching Award.</li><li>• Instructed students on using breadboards for creating digital circuits and utilized Raspberry Pi to demonstrate real-time software-hardware interactions. Additionally, taught ARM and x86 assembly programming.</li><li>• <b>Evaluations:</b> Fall 2019 - Lab 1: <b>4.9/5.0</b>, Lab 2: <b>3.7/5.0</b>; Summer 2020 - Lab 1: <b>4.3/5.0</b></li></ul> | Fall 2019, Summer 2020, Summer 2021              |

## Data Mining (CS 57300)

Fall 2021

Purdue University

- Teamed with two other TAs to co-manage a class of approximately 80 graduate students.
- Earned the Graduate Teaching Award for exceptional responsiveness and support on Piazza, and during office hours.
- Assisted in developing assignments involving data mining algorithms, such as Naive Bayes Classification, Logistic Regression, Bagging, and K-means clustering.

## UNDERGRADUATE TEACHING ASSISTANT

**JAN. 2018 – DEC. 2018**

### Systems Programming (CS 25200)

Spring 2018, Fall 2018

Purdue University

- Collaborated with fellow TAs in running two lab sessions for approximately 20 students each.
- Provided individualized student support through office hours and efficiently addressed course-related inquiries on Piazza.

### Operating Systems (CS 35400)

Summer 2018

Purdue University

- Collaborated with a team of three TAs, including two graduate TAs and one undergraduate TA, to collectively run all lab sections, encompassing approximately 40 students, with a focused curriculum on XINU operating system.
- Graded assignments with other TAs, and developed scripts to shorten the evaluation process.

## RESEARCH EXPERIENCE

### Research Assistant

Dec. 2020 – Present

Purdue University

- Conducted empirical studies with over 500 participants to understand their repeated interactions with an AI-based decision system, publishing results at AIES 2022 on how such interactions influence people's perceptions of fairness and retention.
- Developed an algorithm designed to mitigate cognitive human biases in crowdsourced annotations, thereby enabling the generation of large-scale datasets with reduced bias compared to existing baselines. This enhancement in dataset quality for artificial intelligence models was documented and published in the proceedings of IJCAI 2021.
- Designed and deployed large-scale web apps using Meteor technology as the sole developer, directly facilitating extensive human subject experiments for research projects.

## PUBLICATIONS

**Meric Altug Gemalmaz, Ming Yin.** "Understanding Decision Subjects' Fairness Perceptions and Retention in Repeated Interactions with AI-Based Decision Systems." *Proceedings of the 5th AAAI/ACM Conference on AI, Ethics, and Society (AIES)*, Oxford, UK, August 2022. DOI: 10.1145/3514094.3534201

**Meric Altug Gemalmaz, Ming Yin.** "Accounting for Confirmation Bias in Crowdsourced Label Aggregation." *Proceedings of the 30th International Joint Conference on Artificial Intelligence (IJCAI)*, Online, August 2021. DOI: 10.24963/ijcai.2021/238

## SELECT COURSES

**Graduate Courses:** Algorithms (A+), Operating Systems (A), Statistical Machine Learning (A-), Data Mining (A), Simulation And Modeling Of Computer Systems (A)

**Undergraduate Courses:** Programming with Multimedia Objects (A), Object-Oriented Programming (A), Programming In C (A+), Foundations Of Computer Science (A-), Computer Architecture (A-), Data Structures And Algorithms (A), Systems Programming (A+), Operating Systems (A+), Software Engineering I (A), Software Engr Senior Project (A)

## SKILLS

**Programming Languages:** Python, C, Java, R, ARM assembly, x86 assembly, L<sup>A</sup>T<sub>E</sub>X

**Web Development:** HTML/CSS/JavaScript, Meteor.js

**Tools & Platforms:** MongoDB, Amazon Mechanical Turk, Git, Linux

## REVIEWER

**Conference Reviewer; \*Outstanding Reviewer Recognition**

ACM CHI: 2024\*