

Teaching Statement

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My teaching philosophy centers on the **practical application of fundamental principles** to real-world problems. I aim to create an engaging and inclusive learning environment through **project-based learning, collaborative work**, the **application of core concepts, personalized student support**, and a strong emphasis on **preparing students for advanced study and independent inquiry**. Whether teaching foundational courses or research-focused electives, my goal is to empower students with both the technical proficiency and critical thinking skills needed to thrive in academia and industry.

My teaching experience includes roles as a **research mentor, teaching assistant, and Instructor of Record**. As a mentor, I guided an undergraduate student through an augmented reality research project, involving data collection and collaborative experimentation. As a teaching assistant, I supported a second-semester programming course in Java, grading assignments, hosting labs, guest lecturing, and proctoring exams. I also served as Instructor of Record for an **introductory Python programming course in a flipped classroom format**, where I developed course materials, delivered lectures, hosted office hours, and managed the responsibilities of other teaching assistants.

These experiences have reinforced my belief that students learn best when given opportunities to explore and apply their knowledge in **hands-on, meaningful contexts**. I am particularly interested in offering courses that integrate **research methods into undergraduate and graduate curricula**, especially in areas such as Human-Computer Interaction (HCI), eye-tracking, and augmented reality. Research-focused courses can give students early exposure to open-ended inquiry, helping them build confidence in forming questions, designing studies, and conducting evaluations. In such a course, students would learn to carry out literature reviews, define research goals, and apply both quantitative and qualitative research methods. Topics such as system prototyping, user testing, data analysis, and research ethics would be reinforced through **team projects and structured feedback loops**.

My interest in curriculum development is informed by my own academic journey. During my undergraduate studies, I often found it difficult to access structured research training outside of one-on-one faculty mentorships. It wasn't until graduate school that I encountered formal instruction in HCI research methods—a course that significantly elevated my skills and shaped my academic trajectory. I now seek to fill this gap for future students by embedding **research literacy** into the classroom and making **advanced topics approachable and actionable**.

I also recognize the importance of diverse teaching modalities. I have taught in both **traditional and flipped classrooms**, the latter of which enables active, in-class problem-solving while students absorb lectures at their own pace. Though flipped models can face challenges—such as varied student preparation—I address these through flexible resources, including recorded lectures and hybrid participation options. My approach is rooted in **accessibility, clarity, and support**, ensuring that all students can engage meaningfully with course content.

Ultimately, I view teaching as a form of **mentorship and collaboration**, where students are encouraged to think critically, explore deeply, and connect their work to broader societal impact. By blending research-driven content with inclusive pedagogy, I aim to prepare students for meaningful contributions in computing, design, and emerging technologies.