TEACHING STATEMENT
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Throughout my student life, I have sought and obtained instructional opportunities in formal and informal settings. From teaching my brothers and friends at home to teaching college-level courses, I have been fortunate in finding substantial teaching responsibilities. This practical experience has been invaluable in my development as a teacher. I have learnt to apply different pedagogical methods and have developed class management and mentoring skills. My experiences as a student, as a teacher, and involvement in teacher training programs together have shaped my views on teaching and learning.

Experience

I co-taught the senior introductory course in Computer-Human Interaction (CHI) at Texas A&M University to a class of 45 students. As a part of my instructional duties, I designed the course curriculum, led class discussions of supplementary readings, crafted thought-provoking assignments, and prepared exams. The supplementary readings augmented the theoretical background provided by the textbook with cutting-edge research developments by including recent papers published in leading research conferences. During the inaugural year of Texas A&M’s partnership with the Duke Talent Identification Program (TIP), I designed an engaging curriculum for an introductory course in Interaction Design for 7th through 10th graders and conducted guest lectures and hands-on activities for these young, gifted students.

Over the last few years, I have helped my research advisor in managing aspects of his graduate and undergraduate courses by designing assignments and activities for classes and organizing guest lectures. As a guest lecturer, I have also presented my research and other work relevant to his classes. In addition to imparting formal instruction, I have guided and mentored graduate and undergraduate students through research and design projects.

A desire to improve my teaching techniques and enhance my understanding of the pedagogical and practical issues in college-level teaching motivated me to participate in the Texas A&M Graduate Teaching Academy (GTA) certification program. In addition to the certification, I won one of three coveted travel grants for the Wakonse Conference on College Teaching. Subsequently, I served on the GTA’s steering committee to help organize and oversee the annual GTA program. Through service on the Aggie Honor Council, I have gained valuable insight into fostering ethical conduct in the classroom. This cumulative experience has laid a strong foundation for the instructional facet of my academic career.

Philosophy

A quick web search reveals that the wisdom in the ancient proverb “Tell me and I’ll forget; show me and I’ll remember; involve me and I’ll understand” is attributed to both the Chinese and the Native Americans. While the proverb highlights the importance of active participation for understanding the subject matter, the dispute regarding its origin teases an inquisitive researcher, prompting further exploration for an authoritative answer. This example highlights the two bases of my teaching philosophy: involvement and discovery.

I believe that actively engaging students in practical activities is an effective method for imparting critical skills and techniques. While the techniques provide students with the means to think and explore, the thought process itself must be nurtured. I guide students in solving problems through exploration rather than by prescribing answers. While my students do not always agree upon what the “correct” answer is, I encourage them to back their views and findings with a solid rationale and supporting literature.

The exploratory process promotes creativity, a key ingredient for success in research undertakings. Discovery-based instruction helps me channel my passion for research into the classroom and gives me something to look forward to while grading; instruction is no longer a chore to dispense with. Students in my CHI class often surprised me with their innovative solutions to design problems. In addition to sustaining the instructor’s interest, this creative exploration helps identify promising young researchers.
Techniques

While helping my younger brother with his homework during our middle school years, I realized that he studied, worked, and thought very differently than I did. As our study sessions often ended in arguments, my mother eventually decided that it was best for him to study independently. I have, since, learned to apply a variety of techniques to aid students with diverse learning styles realize their potential.

In my classes, I include a healthy mix of lectures, student presentations, guest speakers, in-class activities, term projects, short-term assignments, and sometimes, exams. The class sessions offer valuable time to involve students in discussions and activities. Discussions about issues covered by the assigned reading materials promote critical thinking among the course participants.

I couple periodic evaluation with pertinent, timely feedback to assess student progress. This evaluation also informs my decisions on modifying teaching methods or course materials. My assignments develop students’ ability to analyze individual pieces, discerningly choose the relevant ones, and thoughtfully combine these to address real-life problems. Students in my CHI class designed novel interfaces for text messaging and ambient e-mail notification. Challenging, creative assignments also promote academic integrity as the solutions for these assignments are not readily available.

Term projects offer students an opportunity to work in teams while applying the knowledge that they have acquired over the duration of the course. Each team identifies a problem, formulates an approach to address this problem, and crafts a solution to realize this approach. Teams periodically report their progress and present a working prototype at the end of the semester. Communicating their findings to others who are not conversant with their problem or the working details of their solution prepares students to interact with audiences who share little common ground with their work.

Outreach and Recruiting

Academic disciplines thrive by recruiting and retaining talent. I participate in departmental information sessions to attract promising undergraduate students into the graduate program and serve on panels that focus on helping graduate students succeed in their program. As a departmental student representative, I meet with faculty candidates and prospective graduate students during their campus visits. I have also been involved with departmental undergraduate recruitment efforts. I designed the curriculum for the Duke TIP Interaction Design course with the goal of attracting middle and high school students into Computer Science programs. For Interface 2006, a software interface design contest for high school students organized by my department, I created the judging rubric and design-oriented problems.

Mentoring

As a senior graduate student in my research group, I mentor new graduate and undergraduate students through their theses, term projects, and independent study credits. I help students in identifying topics of interest with significant research potential. I guide them through hypotheses formulation, system development, and user evaluation of these systems. I often review and edit theses, project reports, and paper drafts for my colleagues. As the evaluation process for in-progress theses and independent study projects is generally informal and flexible, periodic assessment is crucial for ensuring advancement. I help students set short-term objectives while retaining the sight of the overall goals to bring their theses and projects to fruition, sometimes via weekly meetings and by providing need- and issue-based support.

Competency

I am interested in developing courses related to information, interfaces, and interaction, such as mobile and ubiquitous interfaces, digital humanities, and information visualization. In addition, I would like to teach courses in the areas of human-information interfaces, usability, digital libraries, and hypermedia systems. With some preparation, I would enjoy teaching courses in the Computer Science and Information Science core curricula.