Statement of Teaching Interests

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Teaching has always been one of my most favorite activities, mainly because of the great satisfaction I find in imparting to other people the excitement of learning new subjects. It has also helped me deepen my understanding of different subjects by requiring the ability to look at problems from different angles. I believe that good teaching requires many different personal and technical skills, and is a very challenging task. My interest in teaching and my previous experiences both as a student and a teacher, however, give me enough motivation to take this challenge, and envision it as an integral part of my future career profile.

Specific Teaching Interests

My teaching interests are in the areas of communication systems, coding, and information theory. I am particularly interested in teaching fundamental and advanced courses in wireless and digital communications, detection and estimation theory, information and coding theory, and signal processing.

Previous Experience

My teaching experiences started as early as my high school studies, when I held help sessions on different subjects for my classmates. Later, as an undergraduate student, I served as a teaching assistant in the Mathematics department. During my graduate studies, I have been a teaching assistant for several years. This experience involved grading and preparing solution sets for assignments in several courses, and conducting help sessions and guest lecture sessions in the absence of the instructor. I have been a teaching assistant for theoretical courses on wireless and digital communications, as well as a software-based communication laboratory course. I have also participated in several teaching workshops at Rice intended for graduate students and faculty. These workshops addressed several issues including teaching and learning styles, use and abuse of technology in the classroom, teacher’s responsibilities, and other related issues.

In addition to my teaching experience in academic environments, I had been an instructor and director of Training and Supporting Section of Bamdad Computer Company (Tehran, IRAN) for three years, where I had designed and offered several courses on different operating systems and computer networks. These courses were intended for different audiences and covered both theoretical and practical subjects.

In my future opportunities for teaching, I will try to effectively use the valuable lessons I have learned from the above experiences. More specifically, I will use the following methodology in teaching undergraduate or graduate level courses.

Teaching Methodology

I believe that a good teacher needs to (a) be well prepared to present the course material, (b) motivate the students by providing them with practical examples of the applications of the subject, (c) start with simple and intuitive examples to make the subject easily understandable for everyone, but also provide more abstract and in-depth explanations for more advanced students, (d) integrate research elements in advanced courses through projects, and (e) interact with the students and be receptive to their feedback. I will try to integrate the above qualities in my future teaching effort.