**Applicant： X X        Program：(Wireless) Communication**

In my sophomore year, when doing comprehensive experiments on electronic circuits, many students chose the topics given in the textbooks and followed the steps prescribed. As a result, their designs were very much the same, with similar concepts, methodologies and outcomes. I believed that that was not the proper way of learning about electronic circuit because, in putting my knowledge into practice, I must try to attempt at something new, something challenging, so that I could expand my horizon and derive useful lessons even if I should fail. Therefore, I chose to undertake the design of a 抢答器, a device used for answering questions during entertainment shows at TV stations on a “first come first served” principle.  Through my independent design and experiments, I came up with a totally different design project from those of my classmates and I was highly praised by my teacher for my initiative and innovativeness.

In the current educational system in China, students are largely treated as passive recipients of knowledge and students tend to pay little attention to the development of their academic initiative as an important way to acquire knowledge and practical abilities. I love the program in Communication Engineering that I am working on and this love for my specialty has given me special initiative with which I have carried out my academic career throughout my program.

At University of xx, I have been receiving a most rewarding education in communication engineering. xx occupies a leading position in the field of communications both in China and in Asia. According to xx in 2000, xx is rated among the top 17 institutions in Asia. At this prestigious university, I have studied a whole gamut of specialized courses in communication engineering such as Electronic Circuits of Communication, Digital Communications, Modern Communication Technology, and Intelligent Information Security. My academic transcript indicates that I have excelled in all those core courses, through which I have developed a comprehensive understanding, both in breadth and in depth, of modern communications in terms of the basic concepts, principles, and applications.

One thing special about my study of communication engineering is my strong background in mathematics. Achieving the full mark in mathematics in the highly competitive national university entrance examinations, I continued to develop strong mathematics aptitudes at xx. I gained quite high scores for Data Structures and Discrete Mathematics and other related subjects, therefore laying a solid foundation for my program in communication engineering as a whole.

Besides learning communications through Chinese textbooks, I have also endeavored to receive academic input through other channels. I have read western textbooks in original English version such as Computer Networks and Internets by Douglas E. Comer. In addition, as a student member of IEEE’s Circuit and System Society, I have used IEEE explorer to browse the latest papers on communication and circuits and maintaining close contacts with the most authoritative IEEE has allowed me to keep well-informed of the latest developments in the international academia. I have further had the initiative to obtain two important certifications—CISCO Certified Network Associate (CCNA, Sept. 29th, 2003) and Certified Internet Webmaster (CIW Security Professional, June 28th, 2004).

My strong capacity for self-education has contributed immensely to the development of strong hands-on abilities and independent design. In the summer vacation following the 4th semester, I undertook an experiment on the application of a machine control unit. For the hardware design, I used Microchip’s PIC16F877 chip as main component, with keyboard, speakers, LCD, LED as external equipment. In the software programming, I used PIC assembler language, aided by simulation through MPLAB-IDE and online debugging and downloading through MPLAB-ICD package of online debugging tools. The experiment achieved such applications as traffic light control, digital voltage meter, cross-line communications, and electronic piano and I gained important knowledge about I/O terminal, TMR0, TMR1, TMR2, A/D, CCP, USART and other modules.

To further apply my knowledge to practical purposes, I designed an online shopping system based on Microsoft Active Server Pages (ASP) in the following summer vacation. Dreamweaver MX 2004 was used for the webpage design, Microsoft Access was used for database design, and the operating environment was the Windows XP Professional installed with IIS. I completed this project also through self-education and independent design. Those two projects, tentative as they are, have given me a strong sense of satisfaction and achievement when I saw how my designs fulfilled their expected functions.

My practical experience also includes a two-week internship as technology consultant at xx this August. My main responsibility was to perform comparative studies, in collaboration with my teammates, between HP servers and those of the business rivals on a great number of technical indexes and provide important references for competition analysis. Nevertheless, I have also been following the development of new technologies with great interest, especially the 3G and B3G technologies in mobile communication and in next generation network(NGN). As my father is the director of the Information Systems of a provincial bank, I have also developed an interest in the application of communication technologies in financial fields. My research in this area has resulted in the publication of two articles, xx in xx and xx in xx.

With my accumulated knowledge in communication engineering and practical research and development skills, I am well qualified for an MSc program in communication at xx. The UK has already succeeded in constructing its 3G mobile communication network and is preparing for the 4G network where China is just beginning to attempt at the 3G network. Obviously, we have much to learn from the UK and the xx, as one of the world’s leading academic institutions for scientific and technological training and research, is the best place for me to learn advanced theories and technologies in communication. The reputation of Imperial’s academic staff is high—75 percent judged of international research standing, the highest percentage of any UK university. Current staff include Fellows of xx and Fellows of xx while 14 Nobel laureates have been members of the College. Such strong academics are the paramount guarantees for providing quality education to students, not to mention your strong links with both industry and government. Yes, xx is definitely my top priority!

As a participant in Beijing International Marathon Race in 2002 and 2004, I have two important qualities—perseverance and stamina. I am prepared to undertake your program precisely with those two qualities and I believe that only through those two qualities can I develop myself into the first-rate expert on communication.