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CHINA'S HIGHER EDUCATION TRADE AND THE IMPACT OF THE WTO/GATS LIBERALIZATION

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ABSTRACT

CHINA'S HIGHER EDUCATION TRADE
AND THE IMPACT OF THE WTO/GATS LIBERALIZATION

Li-Wen Zhang

International enrollment in higher educational institutions has exploded during the last 30 years. As the number of foreign students has expanded, trade in higher education services has become a booming industry. As the leading supplier of international students to the rest of the world over the last ten years, China has become the largest purchaser and importer of higher education services in the world.

This dissertation examines the trade in higher education services of China with the rest of the world. It provides a comprehensive discussion of the trends and patterns of enrollment of Chinese students abroad, particularly in the United States. It also examines the consequences of the rising enrollment of Chinese students in American institutions. More specifically, it shows the gains to the U.S. economy of the significant fraction of Chinese students enrolled in American universities who, after the end of their studies, stay in the United States as workers. Using the 2000 United States Census of Population Public Use Microdata Samples (PUMS), the dissertation provides a quantitative analysis of the socioeconomic and labor market status of these Chinese workers.

Under its recent accession to the World Trade Organization (WTO), and through current negotiations relating to the General Agreement on Trade in Services (GATS),

China has made some commitments to open its domestic market to the outside world. This dissertation examines China's liberalization of its higher education services market, focusing on the role played by the WTO/GATS. It then discusses the potential effects of the increased liberalization on China's tertiary education sector.

The dissertation concludes with data analysis from an opinion survey on the effects of trade liberalization in tertiary education administered to Chinese higher education stakeholders. Survey respondents generally do not display a negative view on the impact of liberalization, especially when considering its effects on the sovereignty of the Chinese government over the education sector. However, serious concerns were raised about the need for regulation and licensing of foreign institutions operating in China, the quality assurance in those institutions, and the process of certification of degrees or diplomas offered by foreign institutions in China.

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CHAPTER I

INTRODUCTION

International enrollment in higher educational institutions has exploded during the last 30 years. In the United States, the number of foreign students enrolled in colleges and universities expanded from slightly over 100,000 in the early 1970s to close to 600,000 in recent years. This trend has been transmitted to other industrialized nations as well. Between 1994 and 2004, the number of foreign students enrolled in Australian universities rose from 102,153 to 322,776. Universities in Canada and in Europe have also seen their foreign enrollments grow very quickly.

Because international students are foreign residents of the host countries they are studying in, the tuition and other expenditures they pay to their universities are considered to be an export of services–higher education services–by the countries enrolling the students and an import of services for countries that send the students. For instance, when a student from China enrolls and pays for tuition at an American university, he or she is in effect purchasing (importing) educational services from the United States and the American university is exporting educational services to a Chinese national. Although not easy to estimate, the U.S. Department of Commerce–and other

countries–seek to estimate the value of the exports and imports of higher education services through the use of immigration and emigration data as well as surveys of universities. These estimates are published yearly as part of balance of payments statistics.

As the number of foreign students has expanded, trade in higher education services has become a booming industry. Between 1990 and 2004, U.S. exports of higher education services nearly doubled from about $7,409 million dollars to $14,156, measured in constant 2004 dollars. American students enrolled abroad have also increased over time, and so have therefore U.S. imports of higher education services. But the value of U.S. exports greatly dominates imports in this sector, resulting in a huge surplus in the balance of trade in higher education services. In 2004, the balance in the value of U.S. exports minus imports of higher education services was equal to $11,000 million dollars.

Of all countries, China has become the leading exporter of students to the rest of the world over the last 10 years. A survey by the United Nations Educational, Scientific and Cultural Organization shows that by the end of 2000, there were 1.6 million overseas students studying in 108 countries throughout the world. Of these, 380,000 students in 103 countries were from China (UNESCO, 2003). In the United States, the number of Chinese students enrolled in American Universities rose from 1,330 in 1980 to over 60,000 in recent years. In the United Kingdom, the number of Chinese students exploded from 2,883 in 1997 to over 30,000 over the last few years.

As a result of these numbers, many industrialized countries have derived substantial resources from their export of higher education services to China. In the

United States, the estimates are that the balance of trade in higher education services with China in 2004 equaled about $1,402 million, with $1,246 coming from Mainland China and $156 million from the Special Autonomous region of Hong Kong. This is about the same as India's balance of trade in higher education services with the U.S., which was equal to $1,454 million in 2004. This was followed by Korea ($1,003 million in 2004) and Japan ($961 million).

This dissertation examines the trade in higher education services of China with the rest of the world. It provides a comprehensive discussion of the trends and patterns of enrollment of Chinese students abroad, particularly in the United States. It also examines the consequences of the rising enrollment of Chinese students in the United States. The dissertation surveys the issue and provides estimates of the direct and indirect gains accruing to the U.S. economy from the enrollment of Chinese students in American universities. More specifically, it shows the gains to the U.S. economy of the significant fraction of Chinese students enrolled in American universities who, after the end of their studies, remain in the United States. The dissertation examines the socioeconomic and labor market status of these workers and their contributions to the U.S. economy. It also discusses the potential costs and benefits on the Chinese economy, focusing on whether the rise of international education students constitutes a brain drain or a brain gain for China.

But the enrollment of Chinese students abroad constitutes only one aspect of the international trade equation. According to Knight, there are four modes of trade in services in terms of education (Knight, 2003):

Mode 1-Cross-border supply focuses on the service crossing the border, but does not require the consumer to move physically. Examples in higher education include distance education and e-learning.
Mode 2-Consumption abroad refers to the consumer moving to the country of the supplier, which in education means students pursuing all or part of their education in another country, as it has been documented above.
Mode 3-Commercial presence involves a service provider establishing a commercial facility in another country to provide a service. Examples in higher education include branch campuses, such as the Cornell School of Medicine in Qatar, or franchising arrangements.
Mode 4-Presence of natural persons, means persons traveling to another country on a temporary basis to provide a service, which in education would include professors as well as researchers. Many U.S. universities, for example, have exchange arrangements with foreign universities that allow American professors to teach abroad.

This dissertation examines not only the substantial Chinese trade in mode 2 higher education services but also the potential trade in the other three modes. The potential gains and losses from these modes of trade have become a topic of much controversy in developing countries. As with other aspects of globalization, the growing rise of higher education trade has its supporters and detractors. Protesters –including teacher and professorial unions and advocates -- have loudly opposed the entry of foreign competition in higher education markets in developing countries. But the major international organizations–including of course the World Trade Organization–have supported the liberalization of higher education trade. This dissertation will describe the extent to which China trades in modes 1, 3 and 4 with other countries. It then discusses the potential effects of increased liberalization on services, as scheduled under the compromises made by China through its accession to the World Trade Organization (WTO).

I.1 The World Trade Organization and Liberalization of Trade in Higher Education Services

The World Trade Organization has been involved in wide-ranging negotiations over the issue of trade liberalization in higher education services for a number of years now. The negotiations form part of the General Agreement on Trade in Services (GATS). GATS is a multilateral, voluntary and legally enforceable agreement covering international trade in services. Education services, including higher education, are one of the sectors included in the agreement. Once a nation becomes a member of GATS, it is subject to the general obligations of the Agreement and makes specific commitments regarding market access and national treatment in specific sectors, such as in education and health (American Council on Education, 2003). Agreements relating to GATS are ongoing at the time of writing, but the WTO/Doha Development Agenda set the ambitious target date for the conclusion of the trade liberalization negotiations by 2005. They will likely continue until 2006.

The WTO continues to identify paths towards further trade liberalization in higher education services, which it maintains as a high priority (WTO 2000), and has identified a number of barriers to trade in education that need to be eliminated in order to foster trade. The goals of GATS for higher education services include removing restrictions on market access and barriers to competition in higher education. In 2001, the United States, Australia, New Zealand and Japan submitted a proposal outlining their general positions related to commitments in the education sector, demonstrating an increasing interest in exporting higher education. In this connection, GATS challenges local higher

education institutions in developing countries as well as in high-income economies by placing them in direct competition with foreign institutions, thus playing a potentially critical role in the future of higher education around the world.

The current debate on the impact of GATS on higher education is divided in two camps. GATS advocates view the Agreement as a positive force accelerating the influx of private and foreign providers of higher education into countries where domestic capacity is inadequate. Critics, on the other hand, assert that liberalization of trade in education risks weakening local universities, discouraging governments' commitment to and investment in public higher education, promoting privatization of education, and putting countries with weak quality assurance mechanisms at a disadvantage in their efforts to oversee education programs in their countries delivered by foreign providers (International Initiatives, 2004).

Trade liberalization negotiations vary depending on the type of education considered. Trade in education is organized into five categories or sub-sectors of services. These categories are based on the United Nations Provisional Central Product Classification (CPC) including: primary education; secondary education; higher education (including postsecondary technical and vocational education services); adult education (e.g., education for adults outside the regular education system); and other education (e.g., testing and certification). Governments can make commitments for one area, several, all sectors or none of them. To date, 42 WTO members made a commitment for at least one education sub-sector, while 25 among them made commitments in 4 or 5 sub-sectors. Most OECD countries made at least one commitment for an education sub-sector (Zhou, 2003).

The People's Republic of China as a new member of the WTO is one of the only three non-OECD countries (The other two are Thailand and Chinese Taiwan) that have made commitments among the main "importers" of educational services. According to the Ministry of Education, China made partial commitments under GATS, meaning that it would open its service trade to the outside world but only under a set of conditions.

I.2 China's Trade in Higher Education

Trade in higher education in China developed rapidly since China's adoption of its Open Door policy in 1979. The rise of a market-oriented economy has transformed China from an overwhelmingly agricultural economy towards a more industrialized and information -based economy that puts a premium on human capital (knowledge) development. The nation's overall strength is thus believed to depend significantly on the quality of its human resources. Owing to the serious human resource constraints after the Cultural Revolution, higher education, in particular, was considered by the new leadership as a crucial element in enhancing the economic performance of the country (Tsang 2000). In the face of the great need to speed up the nation's economic growth and national development, China began to send students abroad to study in 1979. Since then, China has become the leading country in the enrollment of students in industrialized nations.

But China's higher education market has been opening itself up to the outside world as well (MOE, 2003). While many Chinese students are eager to apply to study in

foreign universities, education officials in China are vowing to provide higher quality services for a growing number of foreign students pursuing higher education in China. Statistics show that some 62,000 foreign students were enrolled in over 360 Chinese colleges and universities in 2002 (China Institute of International Education Report, 2002). In addition, according to a rough estimate by the Ministry of Education, there were 721 joint programs in China at the end of year 2002, an increase of more than nine times over 1995. (MOE, 2002).

The future potential of China as an exporter of higher education services appears to be challenged by China's entry into the WTO, at least in the view of many officials in the Chinese higher education sector. China became a formal member of the WTO on December 11, 2002, but negotiations began much earlier. China's economic reforms qualified China for membership in a number of international economic organizations and the country became an observer of the General Agreement on Tariffs and Trade (GATT) in 1982 and formally applied for full GATT membership in July 1986. The 8th International Trade Round, the so-called *Uruguay Round* (1986-94) replaced the GATT by the WTO. GATT Member-States had determined that international trade could be increased by structuring agreements similar to the GATT that focus on trade in areas other than goods, such as services (e.g. education and health) and intellectual property rights. Thereupon, three multilateral agreements became the pillars within the framework of the new World Trade Organization: the General Agreement on Tariffs and Trade (GATT), the General Agreement on Trade in Services (GATS) and the General Agreement on Trade-related aspects of Intellectual Property Rights. (TRIPS)

In 1987, China applied for WTO accession (China's WTO Accession, WS 2000/2001). After experiencing a long period of international isolation, China had finally reemerged as a major global trader. Indeed, China's growth in exports and its encouragement of foreign direct investment in the special economic zones made the country's development a trade-oriented one, similar to that followed by other East Asian countries such as South Korea and Singapore.

The Communist Party's radical political-decision for China's accession to the WTO meant recognition of the economic benefits of integration to the world economy (China's WTO Accession, 2001). Joining the WTO is seen as a means for accelerating economic restructuring and reform, and hence creating the appropriate condition for further modernization of the country and its long- term growth.

China's comparative advantage in world trade has lied mainly in the production of labor-intensive manufactured goods. Low labor costs have been essential in the initial phase of the nation's economic reforms. Statistics show that during the past decade, only 3.5 percent of the newly increased working population of 189 million possessed a college degree (People's Daily, 2001).

But this is likely to change in the near future. The communist party sees China as a creator of new technologies and as a dynamic leader in the creation and development of new products and industries. For these purposes, higher education has all of a sudden become a sector of strategic significance.

In order to speed up the integration of the nation's economy into the world market after the WTO accession and to improve the quality of its labor force, the government announced in 2002 that China would inject 6 billion Yuan ($731 million) into higher

education and academic research during the nation's Tenth Five-Year Plan for the period from 2001 to 2005. The Ministry of Education predicts that by the end of 2005, higher education enrollment should reach 16 million, among which 0.6 million will be graduate students. By 2010, higher education enrollment should reach 23 million with nearly 1 million graduate students (People's Daily, June 25, 2002).

Putting the current situation into the context of global market competition and China's WTO accession, the Chinese government decided that the country's educational sector should be accessible even to foreign investment following China's accession to the WTO. Indeed, upon obtaining WTO membership China was required to open its services market under the General Agreement on Trade in Service (GATS). Education services, including higher education, are included as one of these sectors.

On entering the WTO, the People's Republic of China made partial commitments regarding the education services sector, agreeing that it would open the sector to international trade under certain conditions. According to the Ministry of Education, China has made the following commitments for the education services sector:

1. No limitations on market access and national treatment in consumption of education services abroad, which means China takes no measures to restrict its citizens from studying or receiving training abroad.
2. Joint ventures in education will be allowed, with foreign majority ownership permitted.
3. Teachers are expected to have the following qualifications: possession of a bachelor's degree or above and an appropriate professional title or certificate, with two years' professional experience.
4. The tuition fees and established by Chinese-Foreign cooperation efforts in running schools will be determined by the government.
5. Services of compulsory education and special education sectors (military, police, and political and party school education) are excluded.
6. No commitments were made for market access and national treatment in cross-border supply.
7. Schools or other educational institutions established independently by foreign institutions will not be permitted (Zhou, 2003).

Some of these commitments have generated concerns among many in China. More specifically, the last commitment, relating to the entry of foreign institutions into the Chinese higher education arena has been seen by some observers as a threat to local colleges and universities. The first commitment, relating to the absence of measures to restrict Chinese citizens from studying or receiving training abroad, has been criticized as well.

This dissertation will determine the opinions and perceptions of higher education stakeholders, including students, professors and administrators, about the potential impact of the liberalization of higher education trade under China's WTO accession. The goal is to understand the extent to which the participants in higher education institutions understand the implications of the trade liberalization and their potential benefits and costs.

I.3 Purpose Statement

The purpose of this dissertation is to study the international trade in higher education services of China and to examine the potential impact of China's accession to the WTO/GATS. The research has three goals: (1) document the rising balance of trade deficit in higher education services between China and industrialized countries, (2) examine the benefits received by the United States from its exports of services to China, including the spillovers and externalities of Chinese students in the U.S., and (3) to study the potential impact of the WTO/GATS and examine the perceptions or misperceptions

of the main stakeholders in Chinese higher education regarding the liberalization of trade in higher education services. In determining the future of higher education trade in China, it is essential to examine the Chinese main education stakeholders' perceptions and responses to this event since these opinions will filter to the government leadership, influencing decision-making.

I.4 Key Research Questions

The main research questions that this dissertation examines are:

1. What have been the patterns of trade in higher education services of China with the rest of the world?
2. What are the costs and benefits of Chinese higher education trade for the United States? What has been the role of Chinese students who have studied in the U.S. on the American economy, both in the higher education sector and elsewhere in the economy? What impact does the expansion of Chinese international education student population have on China's economy? Is there a brain drain?
3. What has been the role played by trade in Chinese tertiary education institutions so far? What are the potential costs and benefits of trade liberalization on the higher education sector of China? What are China's commitments to WTO/GATS relating to trade in education, what is their rationale and what are the likely impacts?

4. How do the Chinese stakeholders perceive the potential benefits and costs of WTO/GATS trade liberalization in higher education?

I.5 Structure of Dissertation

Chapter 2 gives a brief introduction to the patterns of world trade in higher education, focusing especially on the case of China. It describes the trends and patterns of Chinese international education students, particularly those in the United States. It also examines the growing role of foreign institutions of higher education in China, providing a set of case studies on this involvement.

Chapter 3 focuses on the rising visibility of Chinese students in American Universities. It discusses the costs and benefits of Chinese higher education trade for the United States. More specifically, it examines the role of Chinese students on the American higher education sector. It also provides research results carried out in this dissertation on the labor market situation of Chinese students who remain in the United States and their socioeconomic contributions to the American economy. This includes an analysis of their employment, wages and placement within the U.S. industrial development in the last twenty years. The chapter concludes with a discussion of the costs and benefits of China's international students to the Chinese economy, including an assessment of whether there has been a brain drain.

Chapter 4 offers an analysis of China's higher education sector and the government's national development strategies regarding tertiary education. The chapter

provides a statistical overview of China's higher education sector. It then examines the historical development of the higher education sector in China after 1949, including the history under Mao Zedong and the reforms implemented by Deng Xiaoping.

Chapter 5 presents a review of the impact of higher education on economic development, and on the costs and benefits of trade liberalization in the service sector, focusing on trade in higher education services. It also discusses the role played by the WTO in the growth of trade liberalization in services.

Chapter 6 analyzes the opinions and perceptions of higher education stakeholders in China to the trade liberalization sponsored by GATS. The chapter reports survey data collected by this dissertation. The survey provides a description of how Chinese education stakeholders perceive the current phenomenon of foreign education service supply in China's market as well as the potential benefits and costs of the WTO/GATS trade in higher education.

Chapter 7 provides an overview of the results of the dissertation and concludes by reviewing policy issues regarding the problems and challenges facing China's higher education market.

CHAPTER II

THE GROWTH OF CHINA'S INTERNATIONAL TRADE IN HIGHER EDUCATION SERVICES

This chapter documents the rising volume of China's international trade in higher education services with the rest of the world. The chapter starts with an analysis of the definition of what comprises international trade in services and, more specifically, trade in higher education services. Most of this trade is in the form of the enrollment of Chinese residents as foreign students in universities outside China. These constitute imports of higher education services on the part of China and exports for the host countries–the United States, the U.K., Australia, etc.–that enroll the Chinese students. The chapter provides a discussion of the trends and patterns of international student enrollment, particularly those of Chinese, across the world. A history of China's policies towards the enrollment of students abroad is included, providing the background to understanding the rising number of these students.

The enrollment of Chinese students in foreign universities is not the only instrument of Chinese trade in higher education services. In the last few years, a myriad of arrangements have developed by means of which foreign tertiary education institutions

have begun offering their direct teaching and research services in China. This chapter provides a detailed description of these Chinese imports of higher education services, which are much smaller in value than those associated with student enrollment abroad, but not insignificant. The chapter also discusses Chinese exports of higher education services, which include the enrollment of foreign students–such as American students–in Chinese universities.

II.1 International Trade in Higher Education Services: Some Definitions

Both conceptually and statistically, a sharp distinction exists between goods and services. Goods relate to tangible products that are usually produced in one location at a certain point of time, and then later transferred and sold in other locations. Services generally involve outputs that are more intangible and tend to be produced, transferred and consumed at the same time and in the same location. The international Standard Industrial Technical Classification (SITC) system of economic sectors considers services to include wholesale and retail trade; transportation, storage and communications; finance, real estate and insurance; business, professional and technical services; travel and tourism services; and personal, community and social services. Educational services are included as part of the last category, which also includes health services, cultural services, etc (United Nations 2002).

Any transactions that occur between residents of a country and non-residents are considered to be international transactions. Historically, international trade has consisted

mostly of trade in merchandise goods. Whether in the form of agricultural products, mining, or manufacturing, world trade has been dominated by trade in goods. In 2000, for example, trade in merchandise goods accounted for 82 percent of all world trade. Over the last 20 years, however, trade in services has been rising rapidly. In recent years, the value of trade in services has been increasing at a growth rate of close to ten percent per year. Higher education services constitute one of the categories of greatest growth.

In order to differentiate international trade from domestic trade, it is a key to define the residencies of the partners in the transaction. In the case of higher education, for there to be international trade, the purchaser of the services (the importer) must be a foreign resident and the seller of the services (the exporter) must be a domestic resident. This means that the tuition and other expenditures paid by students who enter the U.S. on student visas–who are indeed considered permanent residents of their home countries, not the U.S.–are considered to be an export of services–higher education services–by the American universities and an import of services for the countries that send the students. For example, when a student from China with an F-1 or J-1 visa enrolls and pays for tuition at Columbia University, he or she is in effect purchasing (importing) educational services from the United States and the American university is exporting educational services to China. But if the Chinese student enrolled at Columbia University comes to the U.S. on a permanent residency basis, then there is no international transaction since both the student and the university are considered to be residents of the United States.

The example just discussed, involving the mobility of students to purchase higher education services from other countries constitutes just one of four categories of trade in services. **Mode 1-Cross-border supply** focuses on the service crossing the border, but

does not require the consumer to move physically. Examples in higher education include distance education and e-learning. **Mode 2-Consumption abroad** refers to the consumer moving to the country of the supplier, which in education means students pursuing all or part of their education in another country, as it has been documented above. **Mode 3-Commercial presence** involves a service provider establishing a commercial facility in another country to provide a service. Examples in higher education include branch campuses, such as the Cornell School of Medicine in Qatar, or franchising arrangements. **Mode 4-Presence of natural persons**, means persons traveling to another country on a temporary basis to provide a service, which in education would include professors as well as researchers. Many U.S. universities, for example, have exchange arrangements with foreign universities that allow American professors to teach abroad.

International trade in higher education services, using all of these four modes, has moved together with the expansion of globalization in the last 30 years. But the mode that has been growing the most is mode 2, as reflected in the rising number of foreign students enrolled in thousands of universities around the world. This is documented in the next section.

II.2 The Rise in the Enrollment of International Students in Higher Education

According to UNESCO, in the academic year 2002-2003, a total of 2,377,093 international students registered in tertiary institutions across the world. As Table 2.1 shows, most of these students were hosted by European and North American institutions:

European colleges and universities accounted for the enrollment of 1,158,936 international students in 2002-2003, while there were 646,708 students in North American institutions of Higher Education. The United States is the largest host of foreign students. As Table 2.2 displays, the United States had a total of 586,323 registered students in the 2002-2003 academic year. This was followed by Australia, with 273,601 students, Germany (240,619), the United Kingdom (227,273) and France (221,567). Other countries with substantial numbers of international students include Japan, Russia, Spain, Belgium and Canada.

The number of international students has increased rapidly over the years. Table 2.3 shows the growth of foreign students enrolled in American higher education institutions between 1954-1955 and 2003-2004. As shown, in 1969-70 the total number of foreign students in American colleges and universities was 134,959, which more than doubled in the ensuing decade, to 286,343 in 1979-1980, increasing to 386,851 in 1989-90 and to 572,509 in 2003-2004. The enrollment of foreign students in tertiary education has been rising at a rate much higher than that of domestic students. The proportion of foreign students as a percentage of all tertiary students enrolled in the United States rose from 1.7% in 1969-1970, to 2.4% in 1979-1980, to 2.8% in 1989-90 and 4.3% in 2003-2004. The higher education level at which students enter the U.S. is almost evenly divided between undergraduate and graduate level s, with 48 percent enrolled in graduate schools and 52 percent in undergraduate programs.

The only year over the last 50 years when the number of foreign students enrolled in American institutions of higher education declined was 2003-2004. The drop was not a huge one, from 586,323 to 572,509, and it is partly explained by the slowdown of Asian

student enrollment due to the fears connected to the SARS epidemic in early 2003. But the decline in 2003-2004 follows a year when the enrollment growth was almost nil as well: between 2001-2002 and 2002-2003, the number of students only rose from 582,996 to 586,323. This sudden drop on the growth of foreign student enrollment in the United States has been connected to the tighter visa controls by American immigration authorities, stimulated by the September 11, 2001 terrorist attacks. Many of the students denied visas to the United States have in fact made it to other countries, where the enrollment of foreign students has boomed since 2001.

The growth of international students enrolled in European countries is reflected by the numbers from the United Kingdom, where they increased from 50,684 in 1981-1982 to 197,188 in 1995-1996 and to 227,273 in 2002-2003 (UNESCO 2003). In Germany, the number of foreign students rose from 110,763 in 1980-1981 to 159,895 in 1996-1996 and to 240,619 in 2002-2003. Table 2.4 shows the trend in the number of foreign students enrolled in Australian universities. From 102,153 students in 1994-1995, the international student population of Australia has exploded, to 188,277 in 2000-2001and to 322,776 students in 2004-2005.

Where do the foreign students come from? The Asian and Pacific region is the largest source of international students. This is partly due to the demographics: there are over three billion people in Asia, containing almost 60 per cent of the world's population, and a large fraction of this population has been entering the tertiary education age range (UNESCO, 2003). The region provided 43% of all foreign students studying in OECD countries in 2001. One half of the 1.5 million foreign students studying the OECD area

come from non-member countries. The Asian countries supplying the greatest number of students include China, India, Korea and Japan.

In the United States, Chinese students constitute the largest foreign student population. As Table 2.5 shows, there were a total of 93,982 Chinese international students enrolled in American universities in 2003-3004. Of these, the largest group was from Mainland China, with 61,765, followed by students from Taiwan, China, equal to 26,178, and from Hong Kong, China, equal to 7,353. As a source country for international students, China was followed by Korea (52,484 students), and Japan (40,835).

The high enrollment of Chinese international students in American colleges and universities–as well as in European and other countries–is a relatively recent phenomenon. The next section examines the history of Chinese international education.

II.3 The Growth of Chinese International Education Students

After the emergence of the People's Republic of China in 1949, the country to the Soviet Union for assistance in the training and education of tertiary education sector students. In the 1950s, over 10,000 students enrolled in Soviet universities and post-secondary technical schools. But after relations between the Soviet Union and China soured in the late 1950s, the schooling of Chinese students outside the country virtually disappeared. Although official figures do not exist, estimates are that less than 5,000 students left China to study abroad (mostly to study languages) between 1960 and 1979.

It was only in June of 1978, under the leadership of Deng Xiaoping, that the enrollment of students from Mainland China abroad began to expand. Deng believed it was essential to open the Chinese economy to the outside world, to increase trade and to stimulate foreign investment and technology exchange. One of the pillars of his Open Door Policy was to increase the training and schooling of Chinese students abroad. In October 1978, Deng Xiao Ping stated, "I support the increase in the number of students going abroad for further study, up to thousands and tens of thousands. On one hand it serves to raise the standards of our own colleges and universities, and we can learn more about situations and problems in need of solving (Deng, 1983)." It was Deng's expectation that economic growth in China would be promoted by greater openness to the rest of the world in the field of education. This coincided with the belief that international trade in goods would serve well China's development prospects.

The increased importance given by the Chinese Communist Party to the training and education of Chinese abroad is reflected in the fact that the first international educational agreement with the United States, which was the Understanding on Educational Exchanges, an agreement that allowed and funded the study and research by Chinese undergraduate and graduate students abroad (as well as visiting scholars), was signed in the fall of 1978—even before diplomatic relations between the U.S. and China were reestablished in January 1979. Since that time, the liberalization of international education flows between China and the rest of the world has continued more or less unabated.

The number of Chinese international students has grown from virtually zero in 1977-1978 to 168,702 in 2001-2002, as estimated by UNESCO. Table 2.6 presents the

distribution of students from Mainland China, by host country. The United States is the largest recipient country of Chinese students, with 63,211 students (or 37.5 per cent of the total), followed by Japan with 41,180 students, the United Kingdom (18,122), Australia, Germany, France and Malaysia.

Table 2.7 depicts the explosion in the number of students from Mainland China enrolled in the United States. From 668 students in 1979-80, the numbers rose to 33,390 in 1989-1990, to 54,466 in 1999-2000 and 61,765 in 2003-2004. Note that the upward trend is interrupted for a few years in the mid-1990s. This is a result of a U.S. immigration policy change implemented at the time (the Chinese Student Protection Act), which allowed many Chinese students who had been at the Tiananmen Square demonstrations in 1989 a shift in their status from student visa to permanent resident status in the U.S. Since Chinese students who are permanent residents of the U.S. are not considered international students, the numbers of international Chinese students in the U.S. declined in those years. However, as new students arrived in the ensuing years, the numbers went back up.

The number of Chinese students abroad expands significantly when one includes students originating in the Hong Kong autonomous region and students from Taiwan, China. Since students from both of these regions have been catalogued separately from those of Mainland China, Table 2.7 shows them as well in separate columns. Of course, students from Taiwan have been streaming continuously to the United States since 1949, dominating the Chinese international education population in the U.S. from the 1950s to 1990. In 2002-2003, there were 26,178 students from Taiwan, China enrolled in the United States. Students from Hong Kong have also flowed into the United States

continuously for many decades. Strictly speaking, students from Hong Kong constitute part of China's international education population given that since July 1, 1997, Hong Kong has been a Special Administrative Region of the People's Republic of China. In 2003-2004, there were 7,353 students from Hong Kong enrolled in the United States. Combining all of the Chinese international student groups together leads to a total of 95,296 Chinese international students enrolled in the United States in 2003-2004.

Whereas the first wave of Mainland Chinese students abroad tended to go to the United States, Japan, and Canada, many students are now being attracted to Europe (Leavey 2004). Table 2.8 shows that, in the United Kingdom, the number of students from Mainland China rose from 410 in 1987-1988 to 31,506 in 2002-2003. In Australia, as Table 2.9 presents, the number of students from Mainland China took off in the last five years. From 8,859 students in 2000-2001, the number in 2004-2005 was 68,857.

The Chinese government policy of liberalizing tertiary education flows between China and the rest of the world did set-up the stage for the growth of higher education enrollments of Chinese students abroad. As part of its long-term plans, the Chinese government encouraged and supported higher education students to study abroad. The main goal was to allow China to acquire the knowledge, information and know-how available in the rest of the world, particularly in the science and engineering fields. In addition, the Chinese Communist Party expressed over the years the need to develop a new generation of citizens familiar with Western systems and thinking.

But the policy of higher education trade liberalization only initiated what has truly become a wave of student applications to colleges and universities all over the world in the last decade. In fact, in recent years, going abroad to study has become a trend among

young Chinese. Partly, China's increasing wealth and growing middle class have proved a further spur to studying abroad. Observers, such as Bezlova (2004) have noticed that the number of Chinese students who pay their own fees has risen sharply. In 1981, self-sponsored students accounted for only 7 percent, according to the Chinese Ministry of Education. In 2003, 93 percent of those going to study abroad, paid out of their own pocket. Chinese families spend heavily on Children's education. A survey conducted by China National Statistic Bureau in 2001, shows that more than 60 percent of Chinese families spend one-third of their income on their Children's education (China Today, 2001, November 23).

II.4 Foreign Students in Chinese Institutions of Higher Education

Although in terms of volume Chinese international trade in higher education services is mostly in the form of imports of those services by Chinese students abroad, there is a rising volume of exports as well. These exports are mostly in the form of foreign students registered in Chinese colleges and universities. Indeed, education officials in China are vowing to provide higher quality services for a growing number of foreign students pursuing higher education in China (MOE, 2003).

The data show that in 2003-2004, China hosted 77,715 students from 175 countries and regions. This is substantially greater than the figure for 2002-2003, which was equal to 62,000 (China Institute of International Education Report, 2002). The students were placed in 353 universities or teaching institutions in the country. Among

the foreign students studying in China in 2003-2004, a total of 63,672 or 81.9 percent were from Asia, 6,462 or 8.3 percent from Europe, 4,703 or 6.1 percent from the Americas, 1,793 or 2.3 percent from Africa and 1,085 or 1.4 percent from Oceania (China Daily, 2004, March 19).

The number of American students in China has been rising rapidly, from 782 students in 1991-1992, to 2,278 in 1998-1999 and 3,911 in 2001-2002. As Table 2.10 shows, China is now the ninth destination of American students abroad, with only the United Kingdom, Italy, Spain, France, Australia, Mexico, Germany, and Ireland having greater numbers of American students.

Most foreign students enrolled in China engage in study in Beijing, Shanghai and Tianjin municipalities, and Jiangsu, Liaoning, Shaanxi, Jilin and Zhejiang provinces which have more renowned education institutions than other parts of the country. The greatest fraction of these students are enrolled as exchange students or in specialized, non-degree programs. But the number of foreign students who are pursuing academic degrees has also increased over the past three years. Among the 77,715 foreign students in 2003-2004, 24,616 studied for academic degrees, up 16.9 percent compared to 2002. Among those studying in degree programs, 19,319 or 78.5 percent, studied for bachelor's degrees, 3,397 or 13.8 percent for master's degrees and 1,637 or 6.7 percent for doctorate degrees (China Daily, 2004 March 19).

This expansion of Chinese exports of higher education services is likely to accelerate. The goal of the Department for International Co-operation and Exchanges of the Ministry of Education is for universities across the country to expand admission of

foreign students in the coming three years, to reach the goal of 120,000 foreign students by 2007 (China Daily, 2004, March 19).

II.5 Entry of Foreign Institutions in China's Market for Higher Education Services

Far from being confined to just student mobility, the growing importance of international trade in higher education services is also reflected in the development of new forms of cross-border supply and the emergence of new players in higher education market (Larsen and Vincent-Lancrin, 2002). In terms of the earlier catalog of modes of trade in services, modes 1, 3 and 4 have been growing quickly as well. More specifically, private universities and educational service providers in a number of industrialized countries have expanded in two major new modes of supply for international students, namely, distance education and offshore campuses (Larsen and Vincent-Lancrin, 2002).

Foreign offshore education in China is growing rapidly. Adequate data are not available on the scale of foreign higher education activity in China, but available evidence suggests rapid development. In 2003, there were 712 jointly run educational institutions in China, as "approved" by the Chinese government. Jointly-run education institutions encompass activities ranging from co-developed new institutions, to foreign degrees franchised to an existing Chinese university and programs offering non-degree certificates (Garrett, 2004).

Take Shanghai as an example. In 2002, some 147 Sino-foreign joint schools were operating there, including the well-known Larsarul International Fashion Design College and the Sydney Institute of Language and Commerce, coming from 18 countries and regions such as the United Sates, Britain and Japan. In addition, the Shanghai Star Training Center, authorized by the Wall Street Institute, offers an advanced English training curriculum with fresh educational methods for Chinese students (Xin Hua News Agency, 2002, July 5).

As Figure 1 shows, Shanghai has been at the center in the foreign supply of higher education services in China. But Beijing is not far behind, having over 100 such programs in 2002. This is followed by Shandong and Jiangsu, which also host dozens of foreign higher education programs, as Figure 1 depicts. One case is the University of Nottingham, which became the first British higher education institution to forge a partnership with Chinese education authorities to set up a campus in Ningbo in 2004. In addition, Columbia University in the U.S. will join hands with Beijing Foreign Language Study University to launch a Business Chinese Program in Shanghai, aimed at helping American students to obtain an internship in Chinese companies (Leavey, 2004).

The policy environment in China has been highly positive towards the collaboration of Chinese higher education institutions with foreign institutions. As the 2004 Ministry of Education policy guidelines towards these ventures make clear: "the State (China) encourages Chinese-foreign cooperation in running schools in the field of higher education and vocational education, and encourages Chinese institutions of higher learning to cooperate with renowned foreign institutions of higher learning in running schools (MOE , 2004)." But in view of the development of various new forms of foreign

supply in China's higher education market, the Chinese government has issued regulations regarding the operations of these ventures, such as "Regulations of the People's Republic of China on Chinese-Foreign Cooperation in Running Schools" and "The Implementation Measures for the Regulations on Chinese Foreign Cooperation in running Schools." The first Regulations came into effect in September 2003 (MOE, 2003), and the second regulation came into effect on 1st July 2004 (MOE, 2004).

These regulations have clarified the regulatory environment for foreign education providers in China. Under the General Provision chapter, the regulations set out requirements for the provision of foreign education and note that compliant institutions "shall enjoy preferential policies made by the State and enjoy autonomy when conducting educational activities in accordance with law." Conversely, the regulations stipulate that foreign institutions cannot legally operate independently of State supervision (MOE, 2004, Article 4). In recent years, some Chinese-foreign joint venture education programs were indeed operating illegally in China. For instance, the Department of International Cooperation and Exchange (DICE) of the Ministry of Education (MOE, 2004) announced in 2004 that it had closed 10 such illegal programs. Their illegality was due to their failure to obtain appropriate approvals or the fact that they were not accredited institutions.

In terms of accreditation, the Regulations state clearly that "the recognition of certificates of academic qualifications or certificates of academic degrees of a foreign educational institution granted by Chinese-foreign cooperatively-run schools shall be governed by the international treaties concluded or acceded to by the People's Republic of China or the relevant provisions of the State (MOE, 2004, Article 34)." In addition,

detailed documentation is required on the academic, managerial, and financial resources of the proposed partnership. The information passes through a three-state (government institutions) approvals process, and approved co-operative institutions will be subject to regular quality evaluation and an independent annual financial audit. There is provision for revoking the operating license if serious shortcomings are not rectified within a specified time (Larsen and Vincent-Lancrin, 2004).

II.6 Case Studies of Foreign Higher Education Activities in China

Since there is currently no formal survey of foreign higher education operations in China, the best way to document the growing variety of these ventures is to provide some detailed examples, as is carried out next. The case studies are discussed by country.

The source countries with the highest number of partnerships are Australia, Canada, Japan, and the United States, followed by Singapore, the United Kingdom, France and Germany (The Observatory, 2003). Table 2.11 shows a small subset of the many projects of collaboration between foreign and Chinese institutions of higher education.

Australia has been one of the leading countries in exporting university programs to China, following the broad international education expansion of this country in Asia during the last decade. According to a report by the Australian Vice Chancellors Committee (AVCC), the number of offshore programs of Australian universities has risen from just 25 in 1991 to almost 1,600 in 2003. The number of international students

enrolled in offshore programs of Australian universities now exceeds 70,000. More than 85 percent of these programs are in China (including Hong Kong), Singapore, and Malaysia, with other, much smaller programs scattered around the world, from India and Indonesia to Canada and South Africa (Rizvi, 2004). The Australian government views offshore education as a valuable export sector of its economy.

The following case studies show the great diversity –and magnitude—of the foreign higher education projects that have developed in China, from those which involve relatively limited teaching or research programs to the more ambitious joint ventures to establish semi-independent or independent campuses or institutions.

II.7 Case Study 1: Motorola University (MU) China

Motorola University (MU) China was established in 1988 to train its employees. It was largely created in direct response to China's emerging market driven economy, and by the early 1990s, MU reached an agreement with the Chinese government to provide education initiatives in exchange for business privileges. With centers in Shanghai, Guangzhou and Tianjin, MU has developed many programs targeting senior and midlevel managers from the company's suppliers, strategic partners, state-owned enterprises and customers.

In the field of education, Motorola has instructor agreements with 21 colleges, including the prestigious Peking, Tsinghua, and Nankai universities. Tsinghua and Renmin universities, for example, have been partnering with MU to develop a curriculum

focusing on advanced management. Around 800 participants took part in the program in 2001 and about 850 in 2000.

There are some other key MU projects running in China; including:

(1) An in-house MBA program developed with Arizona State University and Tsinghua University will provide an opportunity for local key talents to obtain advanced degrees. Motorola China realized that many of these local managers had a strong desire to go abroad for further education. To prevent this migration of management abroad and to replace expatriate managers within a short period of time, Motorola China instructed MU to develop an in-house MBA program that could be completed in China in the workplace. The first phase of this program was launched in 1999, and 34 students completed their studies in May 2001. The second phase commenced in October 2001, with more than 40 Chinese managers enrolled.

(2) The Advanced Manufacturing Training (AMT), a special six-month program with Thunderbird International Management School.

(3) An executive MBA in cooperation with the management school of the University of Buffalo, State University of New York (Borton, 2002).

II.8 Case Study 2: Canadian Institute of Business and Technology (CIBT)

Established in 1995, CIBT is quickly becoming a leading provider of educational services in China. CIBT's mission is to deliver the broadest possible educational/career training, by establishing a network of training facilities (traditional classrooms) throughout Asia and by providing training programs via the Internet. To this end, CIBT

has established three schools in Beijing and thereby built the largest joint venture school in China, based upon enrolment size and number of locations (campuses).

CIBT Beijing is among the first in China to receive official approval from the Academic Degrees Committee of State Council to award foreign MBA degrees. CIBT is to be listed independently on the US market in the year 2002 and is majority owned by CAG.

CIBT School of Business was founded as an educational institution jointly formed by Beijing Polytechnic University (BPU) and CIBT Canadian Institute of Business & Technology Corp. With over 100,000 graduates and 40 years of history, BPU is recognized as one of the top 100 universities in China and currently enrolls over 10,000 students annually in its four technical colleges and its Management College.

To address the escalating demand for both western-based technical and academic degree programs in China, CIBT has formed a strategic alliance with City University of Bellevue, Washington. These arrangements enable CIBT to offer career and academic training as well as advanced degree programs. CIBT's partner City University has been a leader in business education at the graduate and undergraduate levels for over 20 years, and is ranked as the fifth among the universities with the largest MBA enrolment in North America. Under their agreement, CIBT has been actively delivering City University's curriculum in Beijing.

As part of its plan to become a leading provider of education services throughout China, CIBT has launched two web sites designed to provide education services via the Internet. The web sites provide additional information to English speaking students and

corporations about CIBT's programs. These developments will position CIBT to be one of the first education providers in China to offer online certificate and academic degrees.

II.9 Case Study 3: University of Nottingham at Ningbo, China

The University of Nottingham in the U.K. has constructed a branch campus at Ningbo, China (located in Zhejiang province) at a cost of £40m project. It is the first British university that has built a full-purpose campus in China. The first students are expected to start courses this September, in classes taught in English by staff imported mostly from the UK. The degrees offered will be from the University of Nottingham, but the University is a partnership of Nottingham with the Wanli educational group, a Chinese institution.

The University of Nottingham is one of the leading institutions selling their services internationally, having one of the largest foreign student bodies in the U.K. and having built already another campus in Malaysia.

II.10 Case Study 4: University of British Columbia

In November 2003, British Columbia signed an offshore school program agreement with China. British Columbia already has one school in China certified to use B.C.'s curriculum, and 21 more are being considered for certification. The program began with 53 students in 1997; enrolment in the program has doubled each year to 1,300

students in year 2003 (British Columbia News Release. 2003, November 5). Although these programs are pre-university programs, the agreement between China and British Columbia also states that B.C. public colleges and universities will be involved in approximately 40 partnership agreements with Chinese institutes allowing for the exchange of students, faculty and research. China is also the second-largest source of international students in B.C., with approximately 4,000 Chinese students studying at B.C.'s 27 public post-secondary institutions (British Columbia New Release, 2003, November 5).

II.11 Case Study 5: Ament Ltd and HaiLan University in Chongqing

Ament Ltd. is an Australian IT networking firm. It has become the first foreign investor to buy a university in China and incorporate the institution into its operations.

The company bought Hailian University in Chongqing for US$16 million in cash and shares in 2002. The university includes three schools and offers degree courses in civil engineering, banking and finance, hospitality, information technology and performing arts.

Enrollment at Chongqing's first private university grew to 5,000 after the first semester. Amnet is confident Hailian will reach its full capacity of 10,000 students in the near future. (World Education News and Review, 2003, February 11).

II.12 Case Study 6: NIIT and Indian High-Technology Education in China

NIIT is an Indian multinational IT software and training firm. NIIT's moved into China that started in 1998 has been followed by its successful forays into other Asia-Pacific markets such as Hong Kong, Thailand, Malaysia, Indonesia and the Philippines. NIIT was the first Indian company to be given permission by the Chinese Government to set up a Wholly Owned Foreign Entity (WOFE) in the country, allowing NIIT to set up professional education centers anywhere in China.

NIIT launched its first educational center in Shanghai in 1998 as a Cooperative Joint Venture with Pudong Continuing Education Centre (PCEC), the education arm of the Municipal Government of Shanghai. It then opened two additional centers (Tian Mu and Tian Sha) in the second half of 1999 before embarking on a major expansion 2001 onwards. NIIT has now established partnerships with over 10 leading universities in China, setting up educational centers within their University campuses. Three of the leading Software Parks in China also have become NIIT Partners and have set up NIIT education centers in their parks. The company has expanded its operations in China because it established a strong credibility through the successful placements of its students in prestigious organizations and institutions across China.

II. 13 Summary and Conclusions

This chapter has provided a broad description and analysis of the various ways through which international trade in higher education services in China has grown.

As shown, most of this trade is in what has been catalogued as mode 2 trade: the purchase of higher education services by Chinese students studying abroad. The expansion of this trade began in 1978, under the leadership of Deng Xiaoping, when China allowed the enrollment abroad of students from Mainland China to grow. Since then, the number of international students from Mainland China has risen to 168,702 in 2002. The United States is the largest recipient country of students from Mainland China, with 63,211 students (or 37.5 per cent of the total), followed by Japan with 41,180 students, the United Kingdom (18,122), Australia, Germany, France and Malaysia. The number of Chinese students abroad expands significantly when one includes students originating in the Hong Kong autonomous region and students from Taiwan, China. In 2002-2003, there were 26,178 students from Taiwan, China enrolled in the United States and 7,353 students from Hong Kong's SAR. Combining all of the Chinese international student groups together leads to a total of 95,296 Chinese international students enrolled in the United States in 2003-2004.

In addition to Chinese students abroad, China's higher education trade has increased through the increased enrollment of foreign students in China. In 2003-2004, China hosted 77,715 students from 175 countries. The number of American students in China has been rising rapidly, from 782 students in 1991-1992, to 2,278 in 1998-1999 and 3,911 in 2001-2002. Chinese authorities have made a priority to increase the exports of higher education services, encouraging tertiary sector institutions to attract foreign students to China.

Other types of higher education trade in China –in modes 1, 3 and 4—have proliferated in the last few years. Foreign offshore education in China is growing rapidly.

In 2003, there were 712 jointly run educational institutions in China. Jointly-run education institutions encompass activities ranging from co-developed new institutions, to foreign degrees franchised to an existing Chinese university, and programs offering non-degree certificates (Garrett, 2004). The variety of foreign operations in China was documented through a set of case studies and examples discussed in this chapter.

What impact has the increased international trade of China in higher education services had? The next chapter will examine the effects of Chinese students enrolled in the United States. Later chapters discuss the impact on China of the liberalization of the country's higher education market to the entry of foreign institutions.

Table 2.1 International Students in Tertiary Education in the World, 2002-2003

Host Region	Number of Students
Total	2,377,093
European Countries	1,158,936
North America	646,708
Oceania	290,933
Asia	240,896
South America	11,714
Africa	27,906

Source: UNESCO, *Global Education Digest*, UNESCO Institute for Statistics, Montreal, 2005.

Table 2.2 International Students in Tertiary Education: Top Host Countries, 2002-2003)

Country	Number of Students
Total	2,377,093
United States	586,323
Australia	273,601
Germany	240,619
United Kingdom	227,273
France	221,567
Japan	74,892
Russian Federation	68,602
Spain	53,639
Belgium	41,856
Canada	40,033

Source: UNESCO, *Global Education Digest,* UNESCO Institute for Statistics, Montreal, 2005.

Table 2.3. International Students Enrolled in the United States, 1954 – 2003

Year	Number of Foreign Students
1954-1955	34,232
1959-1960	48,486
1969-1970	134,959
1979-1980	286,343
1989-1990	386,851
1999-2000	514,723
2000-2001	547,867
2001-2002	582,996
2002-2003	586,323
2003-2004	572,509

Source: Institute of International Education, *Open Doors Report*, November 2004.

Table 2.4. International Students Enrolled in Australia, 1980 – 2003

Year	Number of Foreign Students
1994-1995	102,153
2000-2001	188,277
2002-2003	273,601
2003-2004	304,801
2004-2005	322,776

Source: Australian Government, International Education Network, 2005.

Table 2.5. International Students in American Institutions of Higher Education: Source Countries, 2003-2004

Country/Territory	Number of Students
China	95,296
Mainland China	61,765
Hong Kong	7,353
Taiwan	26,178
India	79,736
Korea	52,484
Japan	40,835
Canada	27,017
Mexico	13,329
Turkey	11,398
Thailand	8,937
Indonesia	8,890
Germany	8,745

Source: Institute of International Education, *Open Doors Report*, November 2004.

Table 2.6 Higher Education Students from Mainland China Enrolled in Foreign Countries, 2001-2002

Host Country	Number of Students
Total	168,702
United States	63,211
Japan	41,180
United Kingdom	18,122
Australia	17,343
Germany	14,070
France	5,477
Malaysia	4,837
Thailand	944
Netherlands	813
Belgium	705

Source: UNESCO, *Global Education Digest,* UNESCO Institute for Statistics, Montreal, 2005.

Table 2.7 Chinese Higher Education Students Enrolled in the United States, 1979-2003

Year	Number of International Students Enrolled in the United States		
	People's Republic of China	Hong Kong, China	Taiwan, China
1979-1980	668	9,903	17,960
1980-1981	2,770	9,660	19,460
1981-1982	4,350	8,990	20,520
1982-1983	6,230	8,610	20,770
1983-1984	8,140	9,428	21,960
1984-1985	10,100	10,130	22,590
1985-1986	13,980	10,710	23,770
1986-1987	20,030	11,010	25,660
1987-1988	25,170	10,650	26,660
1988-1989	29,040	10,560	28,760
1989-1990	33,390	11,230	30,960
1990-1991	39,600	12,630	33,530
1991-1992	42,940	13,190	35,550
1992-1993	45,130	14,020	37,430
1993-1994	44,381	13,752	37,581
1994-1995	39,403	12,935	36,407
1995-1996	39,613	12,018	32,702
1996-1997	42,503	10,942	30,487
1997-1998	46,958	9,665	30,855
1998-1999	51,001	8,735	31,043
1999-2000	54,466	7,545	29,234
2000-2001	59,939	7,627	28,566
2001-2002	63,211	7,757	28,930
2002-2003	64,754	8,076	28,017
2003-2004	61,765	7,353	26,178

Source: Institute of International Education, *Open Doors Report*, November 2004.

Table 2.8 Chinese Higher Education Students Enrolled in the United Kingdom

Year	Number of Students
1987-1988	410
1994-1995	2,368
2000-2001	10,424
2001-2002	18,122
2002-2003	31,506

Source: Nania and Oreen (2004).

Table 2.9 Chinese Higher Education Students Enrolled in Australia

Year	Number of Students
1994-1995	5,637
1996-1997	3,951
1998-1999	3,828
2000-2001	8,859
2001-2002	17,343
2002-2003	47,904
2003-2004	58,574
2004-2005	68,857

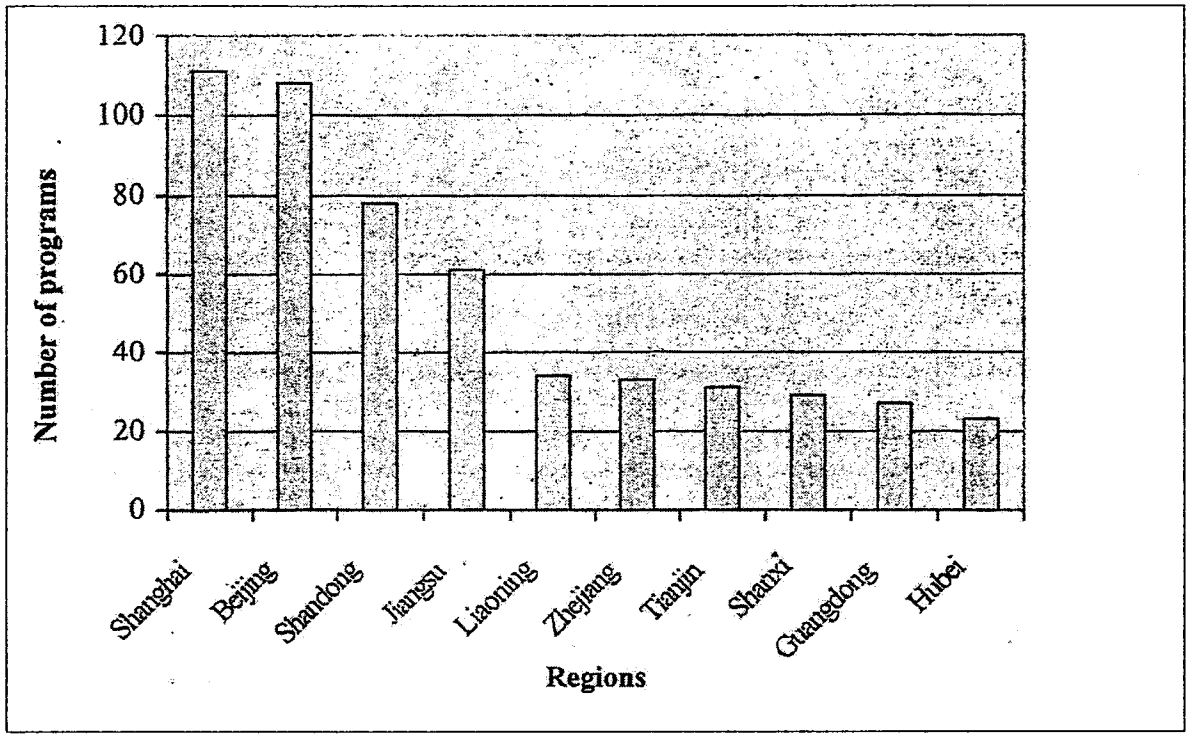
Source: Australian Government, AEI International Education Network, 2005.

Table 2.10 Students from the United States Enrolled Abroad, 2001-2002

Country	Number of Students
Total	160,920
United Kingdom	30,143
Spain	17,176
Italy	17,169
France	12,274
Australia	9,456
Mexico	8,078
Germany	4,850
Ireland	4,325
China	3,911
Costa Rica	3,781
Japan	3,168
Austria	2,180

Source: Institute of International Education, *Open Borders*, 2004.

Figure 1 China's Top Ten Transnational Education Importing Regions



Source: Ministry of Education, China 2003

Table 2.11 Examples of Chinese-Foreign Higher Education Partnerships in China (Ordered by Establishment Date)

Main foreign partner	Country	Chinese Partners	Category	Founded
John Hopkins University	USA	Nanjing University	Joint Centre/special program	1986
China-Europe International Business School	EU	Shanghai Jiaotong University	New institution	1994
Capital Alliance Group (CBIT)	Canada	Beijing Polytechnic University	Foreign owned	1995
Webster University	USA	Shanghai University of Economics & Finance: University of Electronic Science & Technology in China	Joint centre	1997
Lambton College and others-see below	Canada	Jilin University and Southern Yangtze University	Joint Centre	1998
NIIT	India	Various	Foreign owned	1998
University of New England	Australia	Wuxi South Ocean College	Joint centre	1999
University of Dundee	UK	Zhejiang Wanli University	Quality assurance	1999
University of Walkato	New Zealand	Beijing University	Joint Centre	2000
University of Southern Queensland	Australia	Kangda College, branch of South China Normal University	Joint Centre	2001
National University of Singapore	Singapore	Beijing University and others	Joint Centre; special program; branch campus	2001
University of Cambridge	UK	Tsinghua University	R & D; e-learning	2001
University of the Incamate Worrd	USA	Kangda College, branch of South China Normal University	Joint Centre	2002
Amnet	Australia	Chongqing Hailan University	Foreign owned	2002
University of Liverpool	UK	China Education Service Centre	e-learning	2002
Olin School of Business, Washington	USA	Fudan University	Joint Centre	2002

University in St Louis				
SEG International	Malaysia	CUU Education Development Corporation	Joint Centre	2003
Cass Business School, City University	UK	Shanghai University of Finance & Economics	e-learning/joint centre	2003
University of Nottingham	UK	Zhejiang Wanli Education Group	Branch campus	2003 (letter of intent)
Oklahoma City University	USA	Part of the Oriental City of Universities, a consortium of public universities in Langfang, China, south of Beijing	Branch campus	2003 (to open)

Source: The Observatory, 2003

CHAPTER III

CHINA'S IMPORTS OF HIGHER EDUCATION SERVICES FROM THE UNITED STATES AND THEIR SOCIOECONOMIC IMPACT

In October 1978, students from Mainland China began to arrive in the United States under an agreement between the Chinese government and the government of the United States. The agreement of "Understanding on Students and Scholarly Exchanges," marked a dramatic turning point in China's recent educational history, which had been characterized by growing isolationism. In 1979 the Chinese government announced that over 2,000 government-sponsored students and scholars had been sent to over 33 nations. The bulk of these were sent to the United States. Since that time, the number of students from Mainland China in the U.S. has risen to over 60,000.

The tuition and fees as well as the housing services charged by American institutions of higher education to Chinese students represent exports of higher education services for the United States and imports for China. Since China has itself comparatively minor exports of higher education services to America, the United States has a huge surplus in its balance of trade with China. Given recent discussions in the U.S. about the alleged negative consequences of the U.S. merchandise trade deficit with China, it is

important to document one area where the American balance of trade with China is favorable.

What are the social and economic consequences of the import of Chinese students by the United States? This chapter looks first at the effects on the United States. The discussion starts with an analysis of the growth in the value of U.S. exports of higher education services to China, providing estimates of the impact these exports have on the U.S. economy. This is followed by a detailed analysis of the Chinese students who remain in the United States after completing their studies. It is shown that these students are highly skilled and provide a significant "brain gain" effect for the United States. The research in this section examines the labor market contribution of the Chinese students in the U.S., computing rates of return to education among them and showing that they provide substantial value to the U.S. economy.

At the end of the chapter, the discussion turns to discussing the costs and benefits of China's students abroad to the Chinese economy. The traditional brain drain literature has emphasized that the emigration of highly skilled workers can have a substantial negative impact on the source countries. In recent years, however, there has been a growing recognition that an emigration of highly educated workers can provide substantial gains to the home country as well. These gains are related to remittances provided by the emigrants, return migration, the creation of international networks, etc. This part of the chapter discusses the costs and benefits of China's international student expansion to China.

III.1 The Rising Value of the U.S. Trade Surplus in Higher Education Services

Table 3.1 shows how the U.S. trade surplus in higher education services has grown since 1986. That year, the U.S. exported $6 billion and imported $0.7 billion, leaving a trade surplus of $5.3 billion, where these numbers have been adjusted for inflation and are measured in 2004 dollars. By 2004, the United States exports of higher education services had more than doubled, equal to $14 billion. With imports of $2.9 billion in 2004, the U.S. had a substantial trade surplus in higher education services relative to the rest of the world that year, equal to $11.1 billion.

Table 3.2 shows that Mainland China is the second largest importer of higher education services from the United States, following India. In 2003, China imported $1.3 billion worth of higher education services from the United States and exported $0.2 billion, so that the U.S. had a trade balance surplus of $1.1 billion with Mainland China. As Table 3.2 makes clear, if one includes Hong Kong SAP and Taiwan, China, the surplus that the overall Chinese population has with the U.S. grows substantially. In 2003, Hong Kong SAP imported $158 million from the U.S. and exported only $1 million, while Taiwan imported $547 million from the U.S. and exported $1 million. The combined volume of imports of higher education services of the Chinese from the United States in 2003 was therefore approximately equal to $2 billion, which far exceeds India's imports of $1.5 billion.

As reflected in the rising number of students from Mainland China in the United States, China's trade balance deficit in higher education services with the United States has been rising rapidly. Table 3.3 shows the changes between 1991 and 2003. In 1991,

China imported $621 million in higher education services from the United States while exporting $4 million, for a trade balance deficit of $617, where these figures have been adjusted for inflation and are expressed in 2003 dollars. By comparison, as noted earlier, by 2003 Chinese imports had more than doubled, to $1,299 million, while exports had grown to $19 million, leaving a trade deficit relative to the U.S. of $1,246 million.

Note that estimating the value of U.S. exports and imports of higher education services is not an easy task. These exports include not only the tuition and fees paid by the foreign students but also their living expenses (including those of their dependents). Furthermore, when the value of exports is calculated, one must subtract the proportion of tuition and fees paid by U.S. universities or other institutions in the form of scholarships and financial aid to the foreign students. The latter do not count as U.S. exports since the foreign students do not pay for them. The U.S. Department of Commerce is in charge of estimating the value of all of these transactions. For these purposes, they request information from American institutions of higher education on their transactions with foreign students. The figures quoted so far, in Tables 3.1 to Table 3.3, are based on the estimates of the U.S. Department of Commerce, published as part of the U.S. balance of payments statistics.

The Institute of International Education (IIE) also reports on independent calculations of the value of the expenses of international students on U.S. higher education. Their calculations are based for the academic year while those of the U.S. Department of Commerce are based on the calendar year. However, the two estimates come very close to each other. For instance, the value of U.S. exports of higher education services estimated by the U.S. Department of Commerce for 2003 was $13.4 billion. The

IIE estimates are that, for the 2003-2004 academic year, U.S. exports were equal to $12.9 billion. Note that one expects the IIE estimates to be smaller than the U.S. Department of Commerce's since the latter include U.S. exports of higher education services in the form of U.S. universities that sell their services in foreign countries, U.S. scholars offering their services abroad, etc.

Table 3.4 shows the decomposition of the IIE estimates, based on the contribution of international students in the form of tuition and fees relative to living expenses. In 2003-2004, the 572,589 international students enrolled in the U.S. paid $7.4 billion in tuition and fees and $10.5 billion in living expenses (including dependents). If one subtracts from these the $5 billion in financial aid and scholarships received by international students that year, one is left with the $12.9 billion figure quoted by IIE as the net value of U.S. exports of higher education services for 2003-2004. Since IIE decomposes their estimates by state, one can also obtain the exports of higher education by state. In 2003-2004, the state with the highest exports of higher education was California, with $1.8 billion, followed by New York State, with $1.6 billion, Massachusetts and Texas, both with $0.8 billion, and Illinois, Florida and Pennsylvania, each with $0.6 billion.

The data presented in this section has shown the growing importance of U.S. trade in higher education services with the rest of the world. Chinese students constitute the largest buyer of U.S. higher education services. What impact on the U.S. economy do these exports have? The next section begins to analyze this issue.

III.2 The Impact of Trade in Higher Education Services on the U.S. Economy

The theory of international trade has examined for many years the role of exports in the growth of economies. Initially based on the experience of industrialized countries, the theory of export-led economic development eventually made its way as well to East Asia and to other developing countries. It has served as a basis for export promotion policies all over the world, from Mexico to Singapore.

A variety of mechanisms have been postulated in analyzing how exports affect the economy. There are direct and indirect effects. The direct effects relate to the impact of export sales on the output and employment of domestic industries. In the case of exports of higher education services by the U.S., one would look at how international students sustain a myriad of industries in the U.S., in the form not only of the higher education institutions themselves, but also the housing sector, retail industries, etc. These are the direct effects. In addition, as those industries expand, so do the subsidiary industries that support them. There is therefore a multiplier effect of exports. In the case of higher education, as colleges and universities grow and their employment rises, the additional workers will spend their income and sustain a myriad of other sectors of the economy.

In order to provide a rough estimate of the impact of higher education trade on the U.S. economy, existing studies on the impact of exports of goods and services are utilized (Bairak and Hughes (1996), Nishiyama (1997). Estimates of the GNP multiplier of exports for the U.S. economy suggest that a billion dollars of U.S. service exports would support $2.7 billion in GNP growth. Applying this multiplier to the approximately $3.8

billion increase in U.S. exports of higher education services between 1998 and 2004, suggests that GNP in the U.S. increased by close to $10 billion as a result of these exports.

To understand the significance of this economic impact, one can calculate the employment effects associated with these output increases. Table 3.5 shows the average employment impact of a million dollars of U.S. exports, as determined by recent international trade studies, where these employment impacts include both direct and indirect effects. On average, a million dollars of U.S. exports support 16 jobs, although service-oriented sector jobs provide a greater job multiplier because they tend to be relatively labor -intensive. For instance, in the finance and insurance sector, a highly skilled sector similar to higher education, a million dollars of exports create 46 jobs.

If one applies the ratio of 46 jobs per million dollar service exports to the 447 million dollar increase in U.S. exports of higher education services to Mainland China between 1998 and 2003, one realizes that in the last 5 years Chinese purchases of U.S. higher education services alone have helped generate over 20,000 jobs in the U.S. And overall higher education exports have helped generate close to 175,000 jobs over the last 5 years.

III.3 The Impact of Chinese Imports of Higher Education on the U.S. Labor Market

One significant difference between most trade in goods and services and trade in higher education services is that the latter generally involves human beings in a very direct way. For instance, the service imports of higher education services by Mainland

China from the U.S. are mainly in the form of Chinese students enrolled in American universities. Because human beings are involved, higher education trade can have effects that are not traditionally considered in the trade literature, which deals with products that are purchased and sold in the open market. One such effect is the impact that the Chinese students may have if they stay in the U.S. once they complete their studies. At that time, the students pass from being treated as U.S exports of goods and services to U.S. residents who are part of the American economy and labor market.

Two questions emerge from this. First, what is the proportion of Chinese students that stay in the U.S. instead of returning home. Second, for those workers who stay, what is their impact on the U.S. economy and labor market.

In terms of how many Chinese students return home, it is very important to note that when the Chinese open door policy first emerged in the late 1970s and the early 1980s, a large proportion of Chinese students studying abroad were sent by the Chinese government. Accordingly, the Chinese government was very concerned about the rate of students returning to the country. For instance, in the mid-1980s, an official Chinese delegation went to Washington to sign a joint statement with the U.S. Department of Education, reaffirming that state or institution sponsored students from China have "an obligation to return to their homeland (Jacobson, 1987)". In recent years, going abroad to study has become a trend among young Chinese. Observers, such as Bezlova (2004) noticed that the number of Chinese students who pay their own fees has risen sharply. In 1981, self-sponsored students accounted for only 7 percent, according to the Chinese Ministry of Education. In 2003, 93 percent of those going to study abroad, paid out of their own pocket (or received foreign scholarships).

China's Ministry of Education provides estimates of the proportion of students studying abroad that return home. These data are known not to be comprehensive, but they suggest that in the 1980s and early 1990s less than 30 percent of Chinese students studying abroad returned home. In recent years, however, this proportion has increased sharply and may now be over 40 percent. Again, these numbers can only be taken as rough estimates of rates of return home. They are, however, consistent with the fact that the booming Chinese economy is now supplying increasing numbers of jobs at salaries that Chinese students in the U.S. may find attractive, prompting their return home. In the 1980s, on the other hand, such opportunities may have been much more difficult to find.

All indications are that a substantial fraction of Chinese students remain in the United States after completing their studies, entering the American labor market, at least for an extended period of time. What is the impact of these workers?

This section reports the results of research carried out in this dissertation on the socioeconomic status and labor market condition of Chinese students who stay as workers in the U.S. labor market, who shall be referred as "Chinese stayers" in the discussion below. The data utilized is the 5 percent Public Use Microdata Sample of the 2000 U.S. Census of Population.

One cannot explicitly identify Chinese students who stayed in the U.S. in Census data. However, one can select a sample that closely matches this group. The sample chosen was that group of persons residing in the U.S. in 2000 who were born in China, had moved to the United States after 1980, with an age at entry into the US of between 17 and 25 years of age, and who at the time of the Census in 2000 had received a college degree or more in terms of schooling (and were no longer enrolled in school). Now, this

group of people may include some Chinese immigrants who moved to the U.S. with a college degree and who also were in the 17 to 25 years of age range. However, the expectation of this dissertation is that most of the people in this sample are persons who moved in the age range of tertiary education and therefore moved to the U.S. to study, having remained in the country afterwards.

The sample of Chinese student stayers in the United States, as has been identified, has a comparatively high income by U.S. standards. Economists use household income per-capita in comparing the average standard of living of a population. Household income is divided by the number of persons in the household to compute per-capita household income. Table 3.6 shows the annual per-capita household income of various groups in the American population in 1999, as determined from the 2000 Census. As can be seen, the average per-capita income in the U.S. in 1999 was $22,086, which was close to the average as well for the overall Asian population in the country. But the Chinese student stayers had substantially higher income than the average in the United States. Their annual income per-capita was equal to $36,089, which is 63 percent higher than the average for the United States.

The main reason for the high income received by the Chinese student stayers is that they represent –by definition—a highly educated population. In the sample obtained from the 2000 Census, close to 68 percent had more than a college degree (master's or doctoral degrees, for example) and the remaining 32 percent had a college degree. These numbers reflect substantially greater schooling than the average for the American population, as shown by Table 3.7. The percentage of the American population with a college degree or more schooling was 24.4 percent, and even the Asian population

overall –which had the highest schooling attainment in the U.S. in 2000, had a 43.4 percent rate of college completion, compared to the 100 percent for the Chinese student stayers population.

As one would expect from their goals to stay in the United States, the labor force participation rate of Chinese student stayers is substantially higher than the average for the United States. Table 3.8 shows that the male labor force participation rate in the United States in 2000 was 72.7 percent and the female rate was 58.5 percent. By comparison, the male Chinese stayers population had a 93.9 percent labor force participation rate and the female group had a 78.8 percent rate. These numbers are unusually high compared to any other groups in the American resident population and do tend to confirm the expectation stated earlier that indeed the sample selected from the 2000 Census represents Chinese students who have stayed in the U.S. mostly to obtain employment and gather on-the-job experience.

Table 3.9 shows that because of their high levels of schooling, and perhaps motivation and endurance, the unemployment rate displayed by Chinese student stayers is infinitesimal when compared to the rest of the American population. In 2000, the overall male unemployment rate in the U.S. was 3.9 percent, but it was only 0.9 percent (less than 1 percent) for the former Chinese students. Among women, the overall unemployment rate in the United States in 2000 was 4.1 percent, but for the group of Chinese student stayers it was 1.6 percent.

These results suggest that the population of Chinese student stayers in the U.S. constitutes one of the most successful groups in America in terms of socioeconomic status. Their labor market outcomes mean that this population is almost totally immersed

in productive activities within the American economy, implying that they are making substantial contributions to the public coffers in the form of tax revenues. Family size is also way below the average for the U.S., indicating that the number of children is also below-average, which again suggests a population that is draining relatively little from the public sector coffers in the education arena.

The annual average earnings received by the Chinese student stayers – equal to $51,885 in the year 1999-- was about twice the amount received by other workers in the United States that year. Of course, this reflects the schooling of the population. But is there any additional effect that may make this group even more productive? One would suspect that the population of Chinese student stayers is a highly selected group, not only in terms of their choosing to come to the US for study (which suggests strong motivation and drive to succeed), but also in terms of their decision to stay in the U.S. in order to acquire experience. If the group displays extra motivation and drive, this will result in greater productivity on the job which will then be reflected in higher earnings.

In order to test the hypothesis that the Chinese student stayers population has greater productivity than their schooling would suggest, statistical analysis was carried out, estimating Mincerian earnings equations, which have become now standard in the economics of education literature (Psacharopoulos 1995; Patrinos and Psacharopoulos 2004). The methodology involves estimating a semi-log linear equation that shows hourly wages as being determined by a range of explanatory variables that usually include education and labor market experience as the key determinants. The coefficient on the education variable then measures the rate of return to education, in terms of the increase in wages that a year of schooling supplies.

Algebraically, the following semi-logarithmic equation is estimated:

$$\ln W_i = \alpha_1 + \alpha_2 Ed_i + \alpha_3 Ex_i + \alpha_4 Ex_i^2 + \alpha_5 D_i + U_i \qquad (1)$$

where i denotes an individual in the sample studied, the α's are coefficients to be estimated, Ed denotes educational attainment, Ex is years of on-the-job experience, D is a dummy variable equal to one if the person is part of the Chinese student stayers group, and U is a random disturbance term with mean zero and constant variance.

The sample included is the Asian employed population in the United States. The reason the sample is restricted to this population is because the wages of Black, White and Hispanic workers tends to be affected by other labor market factors –such as the presence or absence of discrimination—and comparing the earnings of Chinese workers with other workers in such a complex context may be more difficult and unreliable. Instead, the Chinese stayers are compared to other Asian workers. One could argue that the sample could be limited further to Chinese workers–stayers and non-stayers—but this would reduce substantially the sample utilized in the statistical analysis and it may lead to a geographical selectivity that does not reflect the overall American labor market. Since it is not expected that the diversity present within the Asian population will be as disruptive of the results as that presented by including other racial and ethnic groups, the analysis below is based on the employed Asian population of the United States in 2000.

The hypotheses to be tested are that (1) education provides a positive contribution to earnings, so that α_2 is positive, (2) experience provides a positive but diminishing returns to earnings, so that the coefficient α_3 is positive and α_4 is negative, and (3) because of their greater motivation and drive, belonging to the Chinese student stayers group will be associated with higher wages, so that the coefficient α_5 is positive. To test

the hypotheses, equation (1) is estimated using ordinary least squares for the overall Asian population in the United States. Only employed workers who older than 16 years of age were chosen.

Table 3.10 shows the sample means for the analysis, which is decomposed by gender. Note that the earnings of women were significantly below those of men, for both the overall Asian population and the Chinese stayers group. The Chinese group was younger than the overall Asian population and, therefore, had fewer years of on the job experience (measured by age minus education minus 6). As noted before, the educational attainment of the Chinese stayers group was substantially higher than that of the rest of the population.

Tables 3.11 and Table 3.12 show the results of the regression analysis, as depicted by equation (1). All the hypotheses mentioned above are confirmed. There are positive rates of return to education among both men and women, but they are higher for women. Similarly, there are positive — but diminishing with age — rates of return to experience, with men again having higher returns than women. Finally, the results show that even after controlling for years of schooling and experience, the dummy variable for the Chinese student stayers group is positive and statistically significant. This would tend to support the hypothesis of superior motivation and drive among the former students. However, one should consider the fact that the former students have substantially higher proportions receiving graduate-level degrees. This may affect the results since it may appear that the Chinese group receives higher wages because of factors unaffected by education, when in reality the variable EDUCATION does not distinguish among various levels of schooling.

Tables 3.13 and Table 3.14 report the regression results when the EDUCATION variable is separated into various levels of schooling by means of including several education dummy variables: SOMECOLLEGE (equal to one if the person received some college education but did not graduate from college and zero otherwise), COLLEGE (equal to one if the person received a college degree and zero otherwise), and MORECOLLEGE (equal to one if the person has more than four years of higher education). As can be seen, this change increases the R-squared of the regression equations substantially. The coefficients on the education and experience variables remain, as before, positive and statistically significant in affecting wages. But the coefficient on the dummy variable for belonging in the Chinese student stayer group declines in value and becomes marginally statistically significant for the female sample. For men, however, belonging to the Chinese stayers group still appears to supply higher wages, even after considering the higher level of schooling of that population.

It can be concluded that the population of Chinese students who decide to stay in the United States after completing their studies is a highly successful and productive population in the United States, having per-capita income and earnings that far surpass those of the rest of the American population. Furthermore, it appears that the Chinese student stayers population displays strong motivation and drive, so that their salaries are higher than those of other workers with identical education and experience. This is the case especially for men.

On all of these accounts one can only but conclude that the export of higher education services by the United States has an indirect positive impact on the U.S.

economy when former students decide to stay in the United States and apply their high-level skills and their strong motivation and drive within the American economy.

III.4 The Impact of China's International Student Population on the Chinese Economy

The traditional literature in the field of international migration has emphasized the potentially negative effects that the emigration of highly educated workers may have on the home country. This concern with the effects of the brain drain is directly connected to China's trade in higher education services since many of the Chinese students who study abroad do remain in the host countries and do represent a drain of highly skilled workers to China. This section examines the costs and benefits associated with the emigration of skilled workers.

The classic research on the brain drain postulates that the emigration of skilled workers can cause severe shortages of professional and technical personnel in developing countries, leading to a reduction in the quantity and quality of many crucial services in these countries, including health services, science and technology, etc. (Bhagwati and Hamada 1976). However, more recent research has documented the presence of some substantial positive benefits associated with the presence of a highly skilled labor force located outside the country.

III.5 Return Migration

One crucial factor is whether the emigrants are temporary or permanent. When the migrants leave permanently, their impact on the source economy can be more adverse. On the other hand, if the emigrants return in the future, their effect on the home country can be highly positive. In the case of Chinese students abroad, this is a critical issue. Students who complete their studies and return home will be able to utilize their newly-acquired skills in China, but –at the same time—the lack of experience using those skills will limit their value. Although in high-income countries this may not be a major issue, for a developing country like China, experience using the skills acquired abroad may be as valuable, or even more valuable, than the schooling itself.

This debate on the value of students who stay abroad is reflect in the debate that ensued in the Chinese government in 1988 in relation to the growing number of Chinese students who were staying abroad. Many at China's State Education Committee felt that this phenomenon had to be dealt drastically, through limits on visas as well as through penalties on students who stayed abroad. But the State Science and Technology Commission (SSTC) disagreed and widely raised its voice saying that allowing students to stay temporarily to work abroad would provide substantial gains to China. As Zweig (2002, p.174) states: "the SSTC recognized that only if people stayed abroad longer could they get access to U.S. high-tech facilities, which would benefit China's science and technology sector."

The number of Chinese students abroad who return to China was small in the 1980s and 1990s but it has been rising sharply in recent years. According to China's Ministry of Education, between 1978 and 2002, approximately 580,000 Chinese studied abroad, primarily in the United States, Japan, Britain, France, Germany, Canada, Australia, and Russia (China People's Network, June 19, 2003). Among these students and scholars, 430,000 have remained overseas, including 270,000 who are currently attending school. The other 150,000 have returned to China. From 1992 to 1998, the return rate of "returnees from study overseas" increased by 13 percent each year (China Daily, March 19, 2004). In 2002, a total of 18,000 students and scholars returned to China and in 2003 the total number of returnees exceeded 20,100 (China People's Network, June 19, 2003). Among the latter, 2638 were state-sponsored, 4292 were institution-sponsored, and 13,200 were self-sponsored (Xin Hua News, February 16, 2004). The number of self-sponsored returnees increased by 15 percent in 2003 compared to the previous year, while the number of state-sponsored returnees increased by 7.4 percent (Li, 2004).

The rising return migration of skilled labor to China is consistent with a model that provides substantial gains to the Chinese economy form this emigration. It suggests that many Chinese students abroad are returning after acquiring significant labor market experiences abroad. The skills learned on-the-job in the United States and elsewhere are bound to make these return migrants highly productive in China, allowing them to learn new technologies that they can then transfer to China. For example, statistics of the Shanghai Municipal Personnel Department show some 45,000 returnees now work in the city, serving as high-level managers, senior engineers or starting their own businesses.

Among them, more than 90 percent of the returnees have gained a master's degrees or doctorate, according to the personnel department. In addition, all 23 chief scientists in Shanghai's science sector are returnees with rich professional knowledge and expertise, and more importantly an international perspective (Xin Hua news, 2003, December 22).

Indeed, it has been the recent policy of the Chinese government to foster both the return migration of experienced Chinese residing abroad as well as a continuing to support a flow of students abroad. Even China's public sector itself has adopted a policy of training mid and upper level management officials abroad, both through study and through the acquisition of practical, experience-related skills. As an example –out of many others-- on January 2002 the China Development Research Center of the State Council signed an agreement with the John F. Kennedy School of Government at Harvard University under which China will send 60 bureau-level central government or mayor-level local government officials to study in United States every year (Li, 2005). It is not difficult to predict that this agreement will generate more returnees who have been trained by U.S. and will take leadership positions in governments at various levels in the near future.

This is already happening. Chinese returnees have entered governments at all levels and become high-level officials. Table 3.15 shows four returnees from the United States holding ministerial positions in China. And Table 3.16 presents a list of returnees in the provincial leadership. Note that this list is incomplete since according to Li (2003), records in China at some province-level do not include educational and professional information. However, this table is suggestive of the presence of returnees in Chinese

leadership positions at the present time, a presence that is likely to continue to increase in the future.

III.6 The Labor Market for Highly Skilled Labor

Another key factor determining the impact of the brain drain on the host country is the extent to which the economy is a dynamic one, with great demand for highly educated workers. To the extent that a country is characterized by a sluggish economy burdened by poor governance and the absence of employment opportunities for highly skilled workers, the emigration of such workers will have very limited impact. The situation in many developing countries, where Ph.D.s were claimed to be driving taxicabs may be an exaggeration, but it suggests the situation of underemployment that faces highly educated workers when the demand for their services does not exist.

In the Chinese case, the absence of employment opportunities for highly educated returnees was an issue that led many in the government to refrain from discouraging Chinese students from staying abroad in the 1980s (Zweig, 2002). In recent years, however, the strong demand for highly-educated labor has led to a sharp shortage, which has stimulated return migration. Paradoxically, by avoiding an excess supply of skilled labor back in the 1980s and 1990s, the Chinese students who stayed abroad may have allowed rates of return to higher education to remain high in China, stimulating others to become educated and providing a stimulus to the higher education sector in China. This is a phenomenon that has been discussed recently in the literature. As Schiff (2005, p.202

) notes: "The brain drain raises the expected return to education; this induces additional investment in education (a brain gain); this may result in a beneficial brain drain or net brain gain, that is, a brain gain that is larger than the brain drain; and a net brain gain raises welfare and growth."

III.7 International Networks and Diasporas

A third major mechanism through which the Chinese student population contributes to China's economy is by fostering connections and collaborations with foreign institutions of higher education, science and technology, among others. The diaspora is thus used as an intermediary between China's industry and government and the equivalent on other countries. Part of this connection is in the form of international agreements of cooperation. In the next chapters, the issue of higher education collaboration and trade between China's universities and the rest of the world is discussed.

III.8 Summary and Conclusions

Mainland China is the second largest importer of higher education services from the United States, following India. In 2003, China imported $1.3 billion worth of higher

education services from the United States and exported $0.2 billion, so that the U.S. had a trade balance surplus of $1.1 billion with Mainland China

American exports of higher education services to China have had a substantially positive impact in the U.S. economy. There are direct and indirect effects. The direct effects relate to the impact of export sales on the output and employment of domestic industries The indirect effects indicate that, as those industries expand, so do the subsidiary industries that support them. There is therefore a multiplier effect of exports. In the case of higher education, as colleges and universities grow and their employment rises, the additional workers will spend their income and sustain a myriad of other sectors of the economy. A rough estimate of the impact of higher education trade on the U.S. economy suggests GNP in the U.S. increased by close to $10 billion as a result of the growth of higher education exports between 1998 and 2004. In terms of employment, this economic growth would have generated over 100,000 jobs over the last five years, with 10,000 jobs accounted for by exports of higher education services to Mainland China alone.

One significant difference between most trade in goods and services and trade in higher education services is that the latter generally involves human beings in a very direct way. For instance, the service imports of higher education services by Mainland China from the U.S. are mainly in the form of Chinese students enrolled in American universities. Because human beings are involved, higher education trade can have effects that are not traditionally considered in the trade literature. One such effect is the impact that the Chinese students may have if they stay in the U.S. once they complete their

studies. At that time, the students pass from being treated as U.S exports of goods and services to U.S. residents who are part of the American economy and labor market.

Although estimates are that the fraction of Chinese students in the U.S. returning home has increased in recent years, it is still a fact that the majority of Chinese students stay in the United States after they finish their studies. Statistical analysis carried out in this dissertation using data from the 2000 U.S. census of Population shows that these students have a very high socioeconomic status in the United States. This is partly related to their high levels of schooling, but it is also a result of their high motivation and drive. Regression analysis of wages among the Asian population in the United States indicates that the Chinese student stayers tend to have higher wages, even after controlling for their high levels of schooling. One suspects, therefore, that when Chinese students decide to stay in the United States and apply their high-level skills and their strong motivation and drive within the American economy, there is an indirect, positive impact that has not been considered in the previous literature.

The chapter also discussed the possible costs and benefits of a Chinese brain drain associated with the rising international student population. Although there are clearly potentially negative effects of such a brain drain, the chapter concluded that in the case of China it appears such losses tend to be comparatively minor compared to the potentially large positive effects of the students abroad. The benefits of the brain drain are in the form of return migration, remittances, network externalities, and other effects.

This chapter has so far focused on the effects of China's imports of higher education services, as reflected in the Chinese international student population. The focus has been on the impact of Chinese students studying in American and other universities.

The next chapter begins to discuss in detail China's domestic higher education system and the potential impact of trade.

Table 3.1 The Trade in Higher Education Services of the United States, 1986 - 2004

In millions of US Dollars, Adjusted for Inflation (Expressed in 2004 Dollars)

Year	U.S. Exports	U.S. Imports	Balance of Trade
1986	$6,024	$746	$5,278
1988	6,678	861	5,817
1990	7,409	951	6,458
1992	8,329	1,033	7,296
1994	9,144	1,239	7,905
1996	9,495	1,508	7,987
1998	10,389	1,782	8,607
2000	11,352	2,251	9,101
2002	13,259	2,574	10,685
2004	14,156	2,879	11,277

Source: U.S. Department of Commerce, U.S. International Transactions Tables, various issues. Adjustments for inflation made by the author, on the basis of changes in the U.S. consumer price index.

Table 3.2 Trade in Higher Education Services of the United States: Top Countries

Date for 2003, in millions of US Current Dollars

Country	U.S. Exports	U.S. Imports	Balance of Trade
Total	$13,399	$2,696	$10,703
India	1,457	3	1,454
Mainland China	1,265	19	1,246
South Korea	1,006	3	1,003
Japan	1,015	54	961
Taiwan, China	547	1	546
Indonesia	204	0	204
Thailand	195	4	191
Brazil	193	29	164
Hong Kong, China	158	1	157
Germany	217	73	144
Mexico	294	221	73

Source: U.S. Department of Commerce, U.S. International Transactions Tables for 2003, November 2004.

Table 3.3 The Trade in Higher Education Services Between China and the U.S, 1991 - 2003

In millions of US Dollars, Adjusted for Inflation (Expressed in 2004 Dollars)

Year	U.S. Exports To China	U.S. Imports To China	Balance of Trade of U.S. with China
1991	621	4	617
1992	688	4	684
1994	734	6	728
1996	669	11	658
1998	818	12	806
1999	923	16	907
2000	995	19	976
2001	1,126	12	1,114
2002	1,223	18	1,204
2003	1,265	19	1,246

Source: U.S. Department of Commerce, U.S. International Transactions Tables, various issues. Adjustments for inflation made by the author, on the basis of changes in the U.S. consumer price index.

Table 3.4 Decomposition of Expenses of International Students in the U.S., 2003-2004

Item	Value in 2003-2004
Number of International Students In the United States	572,589
Tuition and Fees Paid by International Students in the U.S.	$7,360,663,857
Living Expenses of International Students In the U.S. (Including dependents)	$10,500,615,728
Sub-Total	$17,861,279,585
Minus U.S. Payments to International Students (Scholarships, financial aid, etc.)	$4,988,079,408
Net Expenses of International Students In the United States	$12,873,200,177

Source: Institute of International Education, *Open Borders*, 2005.

Table 3.5 Total Employment per Million Dollars of U.S. Exports

Sector	Total Employment Per Million Dollars of US Exports
Agriculture	45.54
Mining	24.50
Manufacturing	9.80
Retail Trade	88.51
Finance, Insurance and Real estate	46.25
Services	266.35
Overall	15.57

Source: Vishwanathan (1999), p. 7.

Table 3.6 Per-Capita Income in the U.S., By Race/Ethnicity

	Mean Annual Household Income Per-Capita, 1999
United States Average	$22,086
White Population	25,187
Black Population	14,516
Hispanic Population	12,483
Asian Population	22,260
Chinese Student Stayers	36,089

Source: 2000 Census, 5% PUMS, author's calculations.

Table 3.7 The Educational Status of the U.S. Population, 2000

Persons 25 years of age or older

Population Group	Percentage of the Population with: Less than High School	High School	Some College	College Or More
United States Overall	19.6	28.6	27.4	24.4
White Population	14.5	30.0	28.5	27.0
Black Population	27.4	29.7	28.4	4.5
Hispanic Population	47.5	22.1	19.9	10.5
Asian Population	18.9	16.3	21.4	43.4
Chinese Student Stayers	0.0	0.0	0.0	100.0

Source: 2000 Census, 5% OUMS; author's calculations.

Table 3.8 Labor Force Participation Rates in the United States, 2000

Persons 16 years of age or older

Population Group	Labor Force Participation Rate (%) Male	Female
United States overall	72.7	58.5
White Population	73.8	58.8
Black Population	65.8	60.7
Asian Population	71.8	57.5
Hispanic Population	71.4	53.5
Chinese Stayers	93.9	78.8

Source: 2000 Census, 5% PUMS; author's calculations.

Table 3.9 Unemployment Rates in the United States, 2000

Persons 16 years of age or older in the labor force

Population Group	Unemployment Rate (%) Male	Female
United States overall	3.9	4.1
White Population	2.8	3.0
Black Population	8.1	7.6
Hispanic Population	5.4	7.6
Asian Population	3.2	3.7
Chinese Stayers	0.9	1.6

Source: 2000 Census, 5% PUMS; author's calculations.

Table 3.10 Sample Means for Regression Analysis of Hourly Wages

Variable	Sample Mean			
	Male		Female	
	Overall Asian	Chinese Stayers	Overall Asian	Chinese Stayers
Hourly Wage	$24.1	$33.6	$19.9	$25.6
EDUCATION (Average years of schooling)	14.6	18.9	14.0	18.2
EXPERIENCE (Years of labor market experience)	19.6	8.8	20.3	8.2
EXPERIENCESQ (Years of labor marker experience squared	527.6	94.6	560.5	84.5
SOMECOLLEGE (Proportion with some college education)	0.208	0.0	0.235	0.0
COLLEGE (Proportion with a college degree)	0.281	0.281	0.313	0.265
MORECOLLEGE (Proportion with more schooling than college)	0.236	0.719	0.154	0.735

Source: 2000 Census, 5% PUMS; author's calculations.

Table 3.11 Regression Analysis of Hourly Wages, Males

Variable	Estimated Coefficient	Standard Error	t Statistic
INTERCEPT	1.3200	0.0263	50.1
EDUCATION	0.0897	0.0014	63.8
EXPERIENCE	0.0193	0.0014	14.3
EXPERIENCESQ	-0.0003	0.00002	-11.3
CHINASTAYER	0.2136	0.0450	4.8

Dependent Variable mean	2.844
Number of Observations	19,297
R-Squared (adjusted)	0.19

Table 3.12 Regression Analysis of Hourly Wages, Females

Variable	Estimated Coefficient	Standard Error	t Statistic
INTERCEPT	1.3609	0.0268	50.8
EDUCATION	0.0806	0.0015	54.7
EXPERIENCE	0.0118	0.0013	9.0
EXPERIENCESQ	-0.0002	0.00003	-6.6
CHINASTAYER	0.1560	0.0432	3.6

Dependent Variable mean	19.9
Number of Observations	17,181
R-Squared (adjusted)	0.17

Table 3.13 Regression Analysis of Hourly Wages with Education Categories, Males

Variable	Estimated Coefficient	Standard Error	t Statistic
INTERCEPT	2.1270	0.1701	125.0
SOMECOLLEGE	0.3058	0.0145	21.1
COLLEGE	0.6783	0.0137	49.7
MORECOLLEGE	0.9862	0.0145	68.1
EXPERIENCE	0.0231	0.0013	17.5
EXPERIENCESQ	-0.0004	0.00003	-15.6
CHINASTAYER	0.1582	0.0440	3.6

Dependent Variable mean	2.844
Number of Observations	19,297
R-Squared (adjusted)	0.23

Table 3.14 Regression Analysis of Hourly Wages with Education Categories, Females

Variable	Estimated Coefficient	Standard Error	t Statistic
INTERCEPT	2.0306	0.0171	119.1
SOMECOLLEGE	0.3345	0.0137	24.4
COLLEGE	0.6536	0.0131	50.0
MORECOLLEGE	0.9043	0.0163	55.5
EXPERIENCE	0.0180	0.0013	14.1
EXPERIENCESQ	-0.0003	0.00002	-12.8
CHINASTAYER	0.0780	0.0426	1.8

Dependent Variable mean	19.9
Number of Observations	17,181
R-Squared (adjusted)	0.21

Table 3.15 Returnees from the United States Holding Ministerial Positions in 2005

Name	Position	Country	Foreign school/firm	Degree/Visiting Scholar (VS)
Zhou Ji	Minister of Educatio	USA	New York State University	MA Ph.D.
Chen Zhili	State Councilor	USA	Pennsylvania University	VS
Cheng Jinpei	Deputy Minister of Science & Technology	USA	Northwestern University	Unknown
Suo Lisheng	Deputy Minister of the Department of Water Conservancy	USA	University of Michigan	Ph.D.

Source: GUANG JIAO JING (HK) & LIAN HE ZAO BAO, 2003.

Table 3.16 Provincial Leaders with Educational Experience Overseas

Name	Born	Native Province	Position (2003)	Country	Foreign School/firm	Years	Degree/visiting scholar (VS)	Academic field
Chen Liangyu	1946	Zhejiang	Party secretary, Shanghai	England	Bimingham University	1992	VS	Public administration
Zhang Dejiang	1946	Liaoning	Party secretary, Guangdong	North Korea	Kim Il Song Comprehensive University	1978-80	B.A.	Korean language
Li Hongzhong	1956	Shandong	Vice governor, Guandong; acting mayor, Shenzhen	USA	Harvard University (Kennedy School)	1998-97	VS	Public Administration
Zhang Taolin	1961	Jiangsu	Vice governmor, Jiangsu	Germany; USA	Bohn University; Jison Liebiesch University; University of Iowa	1986-89	Ph.D. (Germany); VS (USA)	Agronomy
Cai Limin	1955	Hebei	Vice governmor, Hebei	Singapore	Singapore Insitute of Science & Technology	1995-96	VS	Public administration
Zhou Yupeng	1947	Jiangsu	Vice mayor, Shanghai	USA	New York University	1995	VS	Economics
Yan Junqi	1946	Jiangsu	Vice mayor, Shanghai	Denmark	Unknown	1983-88	Ph.D.	Engineering
Gamg Lin	1963	Hunan	Vice governor, Hunan	England; Canada	Notingham University; Canada Agricultural Ministry	1997-99	VS (postdoctoral fellowship)	Agronomy
Ma Qingsheng	1944	Anhui	Deputy party secretary, Guangxi	England	John Emis University	1980-83	Ph.D.	Sociology
Xie Xiaojun	1950	Chongqing	Vice mayor, Chongqing	England; USA	Sterling University; Miami University	1994	VS	Biology
Gao Hucheng	1951	Shanxi	Vice governor, Guangxi	France	Paris Number 7 University	1982-85	Ph.D.	Sociology
Zhang Weiguo	1953	Jiangsu	Vice governor, Jiangsu	USA	Unknown	1998	VS	Engineering and management
He Quan	1952	Jiangsu	Vice governor, Jiangsu	Australia	Australian National University	1997-2000	Joint degree with Najing University	Economics
Huang Wei	1961	Jiangsu	Vice governor, Jiangsu	USA	University of California, Berkely	1993-94	VS (postdoctoral fellowship)	Engineering
Li Quanlin	1947	Jiangsu	Vice governor, Jiangsu	USA	University of Maryland	1995	VS	Economic management
Huang Lixin	1962	Jiangsu	Vice governor, Jiangsu	USA	Unknown	1998	VS	Public administration
Zhang Shaoqin	1953	Shanxi	Vice governor,	USA	Auburn University	1985-89	Ph.D.	Material science

			ShanXi					
Jiang Zuojun	1955	Anhui	Vice governmor, Anhui	**USA**	State University of New York, Buffalo	1993-94	VS	Medicine
Li Ronggen	1950	Guangdong	Vice governor, Guangdong	**Germany**	Unknown	1993	VS	Public Administration
Teng Weiping	1952	Zhejiang	Vice governor, Liaoning	**England; Canada**	Cambridge University; Toronto University	1988-1990; 1994-1995	VS	Medicine

Source: "Educational and professional backgrounds of current provincial leaders," (Li, 2003).

CHAPTER IV

THE HIGHER EDUCATION SECTOR IN CHINA: CURRENT STATUS AND RECENT HISTORY

This chapter provides a detailed analysis of the current status of China's higher education sector. The goal is to provide a background for next chapter's analysis of the trade liberalization of the tertiary education sector, as spurred by the WTO/GATS negotiations. Indeed, to understand why China's central government has encouraged GATS trade liberalization in higher education services, it is also necessary first to show in detail the current status of the tertiary education sector in the country and to provide a historical background of the role of higher education on the nation's national development strategy, especially during the Mao and Deng's eras.

The chapter begins with an overview of the Chinese higher education sector and its broad changes since the People's Republic of China was founded in 1949. To understand more clearly the current status of China's tertiary education sector –and its potential future directions—one must examine its recent history. The ideological debates, internal politics and the policy changes under the Communist regime set the stage for the recent progress and challenges facing higher education in the nation. In order to provide a

detailed background on this history, after presenting the current landscape of tertiary education, the chapter turns to a detailed analysis of the history of the sector, and its role in China's national development strategy, first under the Mao era and then under the Deng years.

IV.1 Higher Education in China: An Introduction

China has the highest number of students enrolled in higher education institutions in the world. In 2003-2004, the estimates are that China had close to 17 million persons enrolled in tertiary education. The country with the second-highest enrollment in the world is the United States, with 16.4 million students in 2003-2004.

IV.1.1 Higher Education Institutions in China

There are two types of higher education institutions in China: regular public institutions of higher education, and other institutions. In 2000, a total of 4.6 million new students enrolled in all tertiary education establishments in China. Of these 2.2 million registered in regular institutions of higher education and 2.4 million in other institutions

Regular institutions of higher education are educational establishments enrolling graduates from senior secondary schools and offering higher education courses and training. They include full-time universities, colleges, and professional schools. In 2003-2004, there were 1,683 regular institutions of higher education in China.

Other institutions of higher education include adult public higher education institutions and private institutions. Institutions of higher education for adults refer to establishments enrolling mostly students who are also workers and providing higher education courses and programs in various forms, whether full time, part time, or distance learning. As determined by the historical development of tertiary education policies in China, to be discussed later in this chapter, China's higher education institutions have emphasized the provision of practical skills to the proletariat. This emphasis is still reflected today in the widespread availability of universities for adults. Workers trained in these institutions receive a qualification equivalent to graduates studying in regular programs at regular universities. Institutions of higher learning for adults include specialized teachers colleges, vocational training tertiary schools, distance learning institutions, etc.

Although a potentially important sector, private universities in China currently account only for a small fraction of total enrollment. In 2003-2004, there were close to 200 such institutions operating in China, and only a few (four) were certified to offer bachelor's degrees. In contrast to the U.S., private universities are not the most prestigious institutions in the country and generally fill the needs of students who are not admitted to public universities.

IV.1.2 Enrollment Ratios

The reason for the high absolute Chinese enrollment in higher education is, of course, its huge population. But once one corrects for population, one realizes that

China's tertiary education population is comparatively small relative to its population. In fact, despite its huge enrollment in absolute numbers, the data suggests that, in relative terms, Chinese tertiary education sector is severely under-grown, and perhaps even meager, when compared to other countries at similar levels of income per-capita.

To adjust for age, educational researchers calculate gross enrollment rates or ratios. For tertiary education, the gross enrollment rate is defined as the ratio of the total enrollment in higher education to the population aged 18 to 24 (taken to be the population in the tertiary education age range). Table 4.1 presents tertiary gross enrollment rates for various countries, focusing on those with per-capita income levels similar to those of China. In 2002-2003, China had a per-capita Gross National Income of $4,980, compared with $37,750 for the United States, where the figure for China (and for all other countries as well) has been adjusted for differences in purchasing power relative to the United States. At this level of income, China is considered by the World Bank to have moved into the lower middle-income country category, which includes El Salvador, Peru, Ukraine, Lebanon, Venezuela, etc.

Table 4.1 shows that in 2002-2003 China had a tertiary gross enrollment ratio of 13 percent. This is substantially below the average for low middle-income countries in general, which had a 21 percent enrollment rate in 2002-2003. It is also substantially lower than that of countries such as the Ukraine (with a 62 percent tertiary enrollment ratio, Lebanon (44 percent), the Philippines (31 percent), and Egypt (33 percent), and even lower than that of countries with much lower income per-capita, such as Nicaragua (18 percent), Indonesia (15 percent) and Ecuador (20 percent).

Despite the low tertiary enrollment relative to its population, China has made a great leap forward in higher education over the last ten years. Table 4.2 shows the rapid rise of enrollment in tertiary education since the early 1980s. From 1,662,792 students in 1980-1981, enrollment rises to 3,822,371 in 1990-1991 and then to 15,186,217 by 2002-2003. This last jump, occurring since the early 1990s, constitutes a great advance not only in absolute numbers, but also relative to China's population. The tertiary gross enrollment ratio in China was very low in the early 1980s, equal to 1 percent in 1984-1985. By 1990-1991, the gross enrollment ratio has risen to 3 percent, but it then went up to 13 percent in 2002-2003. This means that, despite its comparatively low higher education enrollment ratio compared to other countries, China has been making great progress in catching up.

Given the disastrously low enrollments prevailing in the 1970s and early 1980s, it is not surprising that China is still today having below-average enrollment ratios. In fact, even as late as 1990, tertiary education enrollment ratios in China were about the same as those in very low-income countries such as Cameroon, Afghanistan, Pakistan, Lesotho and Kenya, all of which had about a 3 percent tertiary enrollment ratio. But by 2002-2003, all of these countries had less than a 5 percent tertiary enrollment ratio, with China leaving them far behind, with a 13 percent enrollment ratio.

The comparatively low higher education activity of China in the 1970s and early 1980s partly reflects the low income in that country at the time, but it also reflects the legacy of the Mao era and the Cultural Revolution, to be detailed later. The impact is graphically depicted in Figure 2, which shows how enrollment in regular institutions of higher education dipped in the early 1960s and only barely recovered in the late 1970s.

All of this happened within the background of a rapidly rising population. It explains the low tertiary enrollment ratios examined earlier.

IV.1.3 Government Spending on Higher Education

The rapid growth of Chinese tertiary education enrollment over the last 15 years is very clear. Government expenditures have increased rapidly as well, at annual rates that have progressively risen over time. Most of this expansion has been propelled by the high rates of growth of income in the country. This has allowed government revenues to grow, which has spilled over into increased education funds. However, it is only in the last few years that government spending on education has risen faster than the rate of growth of Gross Domestic Product (GDP). As a percentage of GDP, China's government education expenditures (its educational fund) actually declined from 2.21 percent in 1990-1991 to 1.73 percent in 1997-1998 (China Statistics Almanac 1998).

As a result of the historically sluggish increases in government spending on education, even in the 1990s, China's government expenditures on education were below those of other countries (Shen, Y., and Du, Z., 2002). Detailed comparative educational expenditure data on various countries was compiled by the OECD in a special study commissioned for the 1999-2000 fiscal year (OECD 2002). In addition to examining OECD countries, the study selected a representative sample of developing countries, which included China. Table 4.3 presents the data on total public spending on education as a percentage of GDP as well as the government spending on tertiary education as a percentage of GDP. In 1999-2000, China's public spending on education was 2 percent

of GDP and its public spending on tertiary education was 0.5 percent of GDP. On both accounts, China's public sector was spending below the average for the developing countries in the sample, which invested 4.2 percent of their GDP on education and 0.8 percent on tertiary education. The gap is higher with respect to OECD countries, which spent close to 5 percent of GDP on education and 1 percent on tertiary education.

IV.1.4 Private versus Public Spending

Of course, one of the problems of the data presented in Table 4.3 is that it includes only public spending on education. But overall spending on education includes both private and public sources. Does this make a difference? Up to 1978, there was virtually no private education in China. Since the market reforms initiated at that time, however, the private sector –in the form of the operations of schools and universities by individuals or non-governmental institutions – has gradually become a major one in China. In addition, public sector institutions have been allowed to charge tuition and fees, generating additional non-government revenues. In terms of the tertiary sector, by 1999 there were 43 private degree granting universities and colleges and 1282 institutions qualified to offer non-degree studies (UNESCO, 2003). In 2002-2003, 36 percent of higher education students were enrolled in private institutions (UNESCO, 2002).

The private sector has supplemented public sector spending in China. By 1999-2000, 43.2 percent of all educational funds in China were originating from non-government sources. This proportion is higher than the average for both developing countries and higher-income economies. For instance, in Malaysia, only 7.3 percent of all

tertiary educational spending comes from the private sector, in Thailand it is 16.7 percent, in Jamaica 29.6 percent, and the overall figure for OECD countries was 20.8 percent in 1999-2000.

But in spite of its more significant private sector, China's overall spending on education, including both public and private spending, as a percentage of GDP, was still comparatively low in 1999-2000, compared to that of other countries. For the sample of developing countries included in the OECD study mentioned earlier, the average total spending on education was equal to 5.3 percent of GDP, and in OECD countries it was 5.5 percent. In China, on the other hand, it was only 3.7 percent. In terms of tertiary education, Table 4.4 presents the data. Again, in 1999-2000 China was spending substantially below the world average. The percentage of GDP allocated to higher education —both public and private— was 0.8 percent in China while it was 1.2 percent on average in developing countries and 1.3 percent in OECD countries.

Since the time the OECD study was carried out in 1999-2000, government allocations to education in China have gradually increased. This responds to commitments made by the government in 1998 that it would increase its higher education expenditures in order to make Chinese universities into world-class universities. This has resulted in significant increases in resources for education in general and the tertiary sector in specific. Between the 2001-2002 and 2002-2003 fiscal years, for example, overall public spending on education rose by 18 percent, almost twice the rate of growth of GDP that year. By 2002-2003, the value of the government education fund had expanded to equal 3.33 percent of China's GDP, and total —public plus private— spending on education had risen to 5.21 percent of GDP, which was about the average

level for other countries in the world. Tertiary education spending rose equally as well, with the country dedicating massive resources not only to current expenditures but also to investments in infrastructure and other capital projects.

The rapidly rising tertiary education expenditures in China are partly the result of its sustained income growth, which has stimulated the demand for education and allowed increased non-governmental expenditures. As (Tsang, 2001) states, "With economic progress and improved material resources, families want more and better education for their children." But policy also has had an impact. In order to understand the changes in China's policies towards tertiary education, and to study the prospects for future changes, one must consider carefully the history of these changes since the advent of the People's Republic in 1949. The next section of this chapter begins this study.

IV.2. Higher Education in China's National Development Strategy: the Mao Era

The People's Republic of China was founded in 1949 and since then the Chinese Communist Party (CCP) has played the key role in the country's social, economic and political lives. The situation of higher education in the country over time has reflected the shifts in policies that have occurred in China since 1949. In fact, changes in the role of higher education in China's national development strategy have always been the result of core conflicts within the inner-party political struggles.

At a macro-theoretical level, changes in higher education policies can be explained by inner- party conflicts between radicals and moderates, as these two factions have debated two alternative views of the higher education sector, one that regards the sector as subsidiary to class struggle and the ideological goal of consolidating and strengthening the dictatorship of the proletariat versus a second, more technocratic view, of developing the nation's human resources and supporting the development of science and technology (Tsang, 2000). Broadly speaking, throughout most of his administration, Mao Zedong and his followers represented the radicals who believed that to achieve national development, the CCP has to (1) continuously support the role of the proletariat in its class struggle, even in a socialist economy, and (2) sustain the revolution and its transformation of the social relations of production. Liu Shaoqi and Deng Xiaoping represented moderates within the CCP. For them, national development is mainly economic and technical, and much less political and ideological (Tsang, 2000). The goal is to manage the development of human resources to maximize economic growth in a rational, socialist economy where the government has command of the means of production. In higher education, the "two-line struggle" between the two fractions inside the CCP has developed into distinctly different strategies over time. The radicals put emphasis on ideological struggle and social transformation, while the moderates focus on economic and material improvement.

IV.2.1 Mao's Thoughts on Education

Educational reform in China cannot be understood without a reference to Mao's thoughts on education. Up to his death in 1976, policy changes in China were filtered through the country's leader. But Mao's views on education, as expressed for example in his writings, are very diverse and can give rise to widely different educational policy regimes. There are four strands that are critical, however, and that were present in educational policies in China at various points during the 1949 to 1976 period, depending on whether the radicals or moderates were in power.

As early as 1939 in Yan'an while the CCP established the Chinese People's Anti-Japanese Military and Political College for workers and peasants who had joined the Red Army during the War of Resistance against Japan, Mao enunciated his principles of the purpose of an education system. Adhering to these norms, two decades later, Mao further set forth a series of "principles of educating youth":

1. Teach them Marxism-Leninism and to overcome petty-bourgeois libertarianism consciousness.
2. Teach them to have discipline and organization and to oppose anarchism and libertarianism organization.
3. Teach them to penetrate resolutely into the lower levels of practical work and to oppose looking down on practical experience.
4. Teach them to become close to the workers and peasants, to serve them resolutely, and to oppose the consciousness of looking down on workers and peasants. (Mao, 1960)

These four principles can be conceptualized into four broad sets of policies that embody them: (1) ideological education of Marxist-Leninist thought, (2) discipline and state control, (3) de-institutionalization and practical experience in learning, and (4) anti-

elitism and anti-bourgeois education. At different points in time, one or more of these concepts were to be emphasized in policy-making, sometimes at the expense of the others.

IV.2.2 Importance of Teaching Marxism-Leninism in the Education System

The ideological approaches adopted by Mao in education were based on his interpretations of Marxism-Leninism. As early as 1938 in his report "The role of the Chinese Communist Party in the national war," Mao stressed the important role of learning Marxism-Leninism within the CCP, "All Communist party members who can do so should study the theory of Marx, Engels, Lenin, and Stalin.... The cadres, in particular, should study these subjects carefully, while members of the Central Committee and senior cadres should give them even more attention (Mao, 1938).

Mao believed," The theory of Marx, Engels, Lenin, and Stalin is universally applicable." The CCP, ".... should regard it not as dogma, but as a guide to action. Studying it is not merely a matter of learning terms and phrases but of learning Marxist Leninism as a science of revolution. The CCP should also study Marxism-Leninism's standpoint and method in examining and solving (China's) problems." Mao further pointed out to the CCP, ".... the spreading and deepening of the study of Marxism-Leninism present a big problem demanding an early solution which is possible only through concentrated effort."

In Mao's view, the institutional education system in China at the time of the revolution was an obsolete regime that needed to be reformed in view of the Marxist-

Leninist principles giving rise to the revolution. He argued that, "In the schools and in the education of cadres at work, teachers of philosophy do not guide them to study the logic of the Chinese revolution; teachers of military science do not guide them to strategy and tactics adapted to China's special features; and so on and so forth. Consequently, error is disseminated doing people great harm (Mao, 1941)."

IV.2.3 De-Institutionalization and Practical Experience in Learning

Starr (1979a) has pointed out in reviewing Mao's educational principles as set up in Yan'an that the revolution sought to break down the existing, institutionalized education system and to reestablish new pedagogical principles touching upon every aspect of the education system: curriculum, faculty, students, and the management of the schools. Starr noticed that the impulse toward de-institutionalization was a core element in Mao's proposals for reform of the curriculum and pointed out that Mao opposed the institutionalization of education on three analytical grounds.

First, Mao believed that the institutionalization of education de-politicizes the learning process, whereas he saw the linking of the inculcation of information and skills to the conveying of political principals, techniques, and values as being the only means of resolving the contradiction between red and expert in the political system.

Second, the confinement of education to the classroom results, Mao argued, in a kind of learning that is irremediable divorced from its practical applicability- an outcome that not only causes an estrangement of the education system from the process of

economic development, but also, more fundamentally, conveys to the student a mistaken sense of the relationship between theory and practice.

Finally, the institutionalization of education places, for instructional purposes, the least corrupted members of the society in the hands of the most easily corruptible, hardly a situation designed to solve the problem of the bourgeoisie in a socialist society.

IV.2.4 Anti-Elitism and Anti-Bourgeois Education

In determining the role of intellectuals after the revolution, Mao had expressed serious reservations about whether they could be trusted as part of the social transformations he expected to occur. He observed that while the system of capitalist exploitation had been eliminated and the economic foundation of the bourgeoisie and landlord classes had been removed, nevertheless, "We must...continue to wage a struggle against them. The overthrown reactionary classes may attempt a comeback. In a socialist society, meanwhile, new elements of the bourgeoisie may emerge; Classes and class struggle remain during the entire period of socialism." Mao's view was that intellectuals were especially vulnerable to the corrupting influences that create new bourgeois elements in a socialist system. He noted that the problem lay in an intellectual's relationship to his or her knowledge and pointed out, "Some people consider knowledge as their own possession and wait to get a good price for it in the market. When the price is not high enough for them, they refuse to sell their knowledge. They are expert only, but not red (Mao, 1961)." Mao's view represented the attitudes of the majority of radicals of the CCP toward intellectuals, which included most of the academic community.

Mao believed that intellectuals must part with their Confucian past. Their belief was that education was dominated by Confucian ideas and had served as a tool to oppress and discriminate against the children of the working class in Chinese society for a thousand years. They feared that the intellectuals had not been changed by the revolution, and that they continued to perceive themselves as being more worthy than the rest of the population. Mao explained the origin of these, essentially anti-intellectual, feelings: "Professors: we have been afraid of them ever since we came into towns. We did not despise them, we were terrified of them. When confronted by people with piles of learning we felt that we were good for nothing. For Marxists to fear bourgeois intellectuals, to fear professors while not fearing imperialism, is strange indeed...we must not tolerate it any longer (Mao 1958)."

The educational thoughts of Mao were diverse and alternated in the way they saw their entry into policy. The timing of the changes over time were partly determined by the relative strength of the radical and moderate elements within the CCP, with Mao generally aligning with the radical elements. The next sections examine this interplay.

IV.2.5 Education Reforms After the Revolution: Ideo-Political Education

After seizing power in China in 1949, Mao Zedong and his revolutionary followers saw the nation as plagued by "old ideas, old cultures, old customs and habits of exploiting classes." They viewed the process of reaching the communist goal of the nation's economic, social, and political development as a revolutionary one, following Mao's own vision of Marxism-Leninism in a country where rural peasants, not the urban

proletariat, dominated the population. The Constitution of the People's Republic of China reflected these goals, stating that the nation is to be a "...people's democratic state led by the proletariat and based upon the alliance of workers and peasants." The Constitution reaffirmed that (1) Marxist and Leninist principles applied to the organization of the national economy, that is, the people own the means of production, and (2) political theories, state organs, laws and education all should reflect the socialist model.

The influence of ideology was hammered sharply into the national consciousness in 1951. After China was drawn into the Korean War, an initial moderation in domestic policies gave way to a massive campaign against the "enemies of the state," actual and potential. These enemies consisted of "war criminals, traitors, bureaucratic capitalists, and counterrevolutionaries." The campaign was combined with party-sponsored trials attended by huge numbers of people. The political movement was so called "Three-Antis and Five-Antis" which aimed at counteracting capitalists and the West in the international arena and to combat corrupt bureaucrats and other domestic opponents who sided with "enemies" of the Communist regime. In the field of education, the government nationalized educational institutions at all levels, including private universities and schools previously controlled by Kuo Min Tang (the National Party). The government also centralized planning and financing of education and regulated its common language (Putong-hua, standard Mandarin) in teaching (Tsang 2000; Xu 2002).

In terms of curriculum and instruction, the official CCP newspaper, "the People's Daily," of 11 October, 1949, ten days after the establishment of the People's Republic of China, carried an article advocating the inclusion of Marxist theory courses as a major part of the socialist ideo-political education in schools at all levels including universities.

Such courses symbolize the remodeling of the old universities into ones that belong to the Chinese people (The National Institute of Educational Research, 1984).

The then deputy education minister Lan Jun-ru talked about the future of education in December 1949, he stressed the rationale for borrowing three types of experience to build up education in the newly established People's Republic of China: the good experience of the new education accumulated in "liberated areas" (Those occupied by the Communist Party during wartime.); some beneficial experience from the old Chinese (traditional) education; and the advanced Soviet experience (Yu, 1994).

The latter factor, the experience of the Soviet Union, became essential in the early days of the People's Republic. In 1949, the country had been isolated by the Western powers led by the U.S. Then in the early 1950's the Korean War further isolated China and encouraged Mao to look to the Soviet Union (Gittings, 1993; Spence, 1999). The Soviet Union was the first country where a communist revolution had succeeded in establishing a full-fledged socialist economy and supplied China with a ready example to follow. Not only had the Soviet Union rapidly achieved industrialization but it became a strong rival to the United States. Mao and his followers realized that China could use the experience of the Soviet Union for reference.

The new Chinese government imported not only the Soviet's economic policies but also their higher education policies. During the 1950s, scores of students were sent to Soviet universities. And the education authorities proceeded to adopt the structures of the Soviet system. The educational system in the Soviet Union, developed under a Stalinist regime and reinforced by the special circumstances of the Soviet revolution, the extensive internal purges, and long periods of war, was highly-centralized, with strong state control

(Yang, 2002). It was also based on ideo-political education at all levels, including the universities. These characteristics of the Soviet regime appealed to Mao, whose educational philosophy shared them, as discussed in the last section .

The CCP, under the guidance of the Soviet model, reformed Chinese higher education in the early 1950s. In order to use higher education to serve the economic and political objectives set by the First Five-year Plan, the CCP launched its first large-scale reform of higher education in 1952 and 1953 (Chen 2002). The reform plan was called "Yang Xi Tiaozheng", which means the reordering of colleges and departments. According to Chen (2002), the reordering involved two important aspects: the geographical rationalization of higher education layout, and the reestablishment of new types of institutions with special emphasis on the development of new engineering universities, both polytechnic and specialized, and teachers colleges. Teaching methods and styles became more uniform, and a plan drawn from Russian methods was implemented.

All institutions were put under scrutiny and reorganized by department and specialization. Comprehensive institutions were dismantled and divided into more specialized universities or institutes, dedicated to engineering, agriculture, medicine, teachers colleges, etc. Following the initial years of reform from 1951 to 1953, the total number of higher institutions was 182. Among these institutions there were 14 comprehensive universities, 39 engineering, 31 teachers, 29 agriculture, 29 medical, 6 financial, 4 political and law, 8 language, 15 art, 5 sport, 2 ethnic, and 1 other (CIES, 1984).

The curriculum of the universities was also reformed. In importing the Soviet model, Chinese authorities therefore decided to copy the Soviet experience and offer courses on Marxist theory at all Chinese schools and universities. Thus socialist ideo-political learning became a major part of Chinese education. The Ministry of Education decreed in October 1952 that programs of study in higher education must include courses in Marxism, Leninism, and the thought of Mao Zedong (MOE, 1952). Students in higher education were required to internalize a whole set of Marxist and Leninist ideo-political attitudes and values and give evidence of behaviors, specific beliefs and strong loyalty to the communist ruler (Yang, 2002).

Table 4.5 demonstrates courses given in 1952 through the regulation of the Ministry of Education. These courses were: The component parts of Marxism (Foundations, Dialectical and Historical Materialism), New Democracy (later History of Chinese Revolution since July 1953), and Political Economy. This document also specified that the political guidance section be in a specific instructional framework with a framework and personnel.

Although ideo-political education as imposed by the CCP in all Chinese schools was a central component of the educational reforms, it resulted in intra-party clashes which over time resulted in realignments, with official policy on education alternating between radical ideological imperatives and moderate efforts to provide a pragmatic, technical education to promote national development. These two were often incompatible and clashed with each other. For example, the emphasis on providing abstract ideological education frequently obstructed the pragmatism necessary for development purposes.

During the period of 1953-1956, the moderates within the CCP had the upper hand. The decision had been made to adopt the Soviet's experience in embarking on an intensive program of industrial growth and socialization. The educational system was thus reformed to follow what was seen as a successful Soviet economic model, which was based on state ownership, large collective units in agriculture, and centralized economic planning. Soviet style development was manifest in the CCP's First Five Year Plan (1953-1957). As in the Soviet economy, the main objective was a high rate of economic growth with primary emphasis on industrial development at the expense of agriculture and with particular concentrations of capital heavy industry and intensive technology. This development goal required a large pool of labor talent, mainly scientific, technical and professional workers. A major reorganization of higher education to emphasize a more technical curriculum became inevitable (Chen, 2002). This clashed with the emphasis on ideological education noted earlier.

The Soviet model had led the Chinese government to an emphasis on the training of a more technical labor force in order to reach the country's industrialization goals. Although the radical ideological elements within the party were ever-present, the moderate factions within the CCP had the upper hand at the time. But by 1956, the internal ideological struggles within the CCP were beginning to turn things around.

In 1957, a reform movement was launched under the classic slogan "Let a hundred flowers bloom, let a hundred schools of thought contend." The Communist Party, at first, invited intellectuals to air constructive views freely and openly to the CCP. By mid-1957, however, the movement unexpectedly became bolder and brought denunciation and criticism against the party in general and the excesses of its cadres in

particular. Startled and embarrassed, leaders turned on the critics as "bourgeois rightists" and launched the Anti-Rightist Campaign.

The Anti-Rightist campaign marked the beginning of a break with the Soviet model and the search for an indigenous model in both the economy and education based on Mao's thought. Higher education had a key place in this movement and became the battleground between moderates and radicals.

IV.2.6 The Struggle Within the CCP Over Higher Education Policy: "Redness versus Expertise"

Major educational reforms were implemented in 1958 as part of the Great Leap Forward campaign. These reforms were important because they also gave a preview of the even more radical reforms to be adopted during the Cultural Revolution. Underlying the new policies was Mao's idea –discussed earlier-- that education must have a practical foundation. This was put in practice big time.

Combined with the educational reforms was an attack on academics and intellectuals. As noted earlier, Mao had devoted considerable attention to the problem of the relationship between intellectuals and the knowledge they possessed. Mao and the CCP radicals believed that intellectuals who consider knowledge as their own possession and who have no willingness to serve the socialist society were politically wrong. They were "experts" but not "red." To counteract this tendency, throughout the educational system, including universities, both students and professors were asked to engage in manual work, from farming to building steel-based furnaces. In September 1958, this approach was formalized by the CCP in its Directive on Education, which colleges and

universities were integrated with factories. Universities began to operate productive activities. Beijing University opened twenty factories or workshops in two weeks. As many as 397 colleges and universities operated 7,420 factories (Cheng and Manning 2003).

The second component of the Great Leap Forward educational reforms was a re-focus of schools and universities from what Mao saw as institutionalized elitism towards a vision of combined work-education institutions that would educate workers and peasants to become intellectuals themselves. "Intellectuals are indispensable." Mao commented in 1958. "The proletariat must cultivate its own talents. They must be up to a certain cultural standard, having scientific knowledge, and be trained in polished phraseology (Mao, 1958).We must educate a lot of people-the sort of people who are the vanguard of the revolution, who have political farsightedness, who are prepared for battle and sacrifice, who are frank, loyal, positive, and upright; the sort of people who seek no self interest, only national and social emancipation, who show, instead of fear, determination and forwardness in the face of hardship; the sort of people who are neither undisciplined nor found of limelight, but practical, with their feet firmly on the ground. If China educates such men, the tasks of the Chinese revolution can easily be fulfilled (Mao, 1937)."

In proposing a long-term solution to this gap between technical and political expertise, Mao and his followers decided the answer was to train politically reliable cadres in the necessary technical fields. This type of training was called "red and "expert." As a result of this approach, all throughout China factories opened schools and universities. For instance, the Liming Machinery Works in Shengyang began to operate a

university with the goal of training hundreds of workers and providing them with university diplomas.

The Great Leap Forward campaign ended in failure, with economic growth collapsing and a major famine developing in 1959 and 1960, which was compounded by massive floods in 1959 and a severe drought in 1960. As an outcome of this, Mao remained as Chairman of the CCP but withdrew from public view. The moderate Liu Shaoqi became President of China and Deng Xiaoping General Secretary of the CCP.

In contrast to Mao's view on the presence of an ever-permanent class struggle in socialist society, Liu Shaoqi and other moderates within the party favored a "theory of the dying out class struggle." Liu believed that China's socialist transition period was marked by gradual diminution of the class struggle (Liu, 1957). They were not afraid of supporting intellectuals and an exclusive focus on academics by higher education institutions. The result was the development of a new education reform program, "Walking on Two Legs" that prevailed between 1962 and 1965. Led by the thought of Liu Shaoqi, a two-track higher education system was implemented. One track was oriented to vocational and work-study programs, predominantly targeting adult workers. The second track was the regular university and college program, targeting full-time students that would train in more technical and advanced education programs.

But these educational reforms became the center of contention for the radical factions within the CCP, which led to the Cultural Revolution in 1966. The educational policies were clearly intended by the moderates to encourage rapid industrial and agricultural modernization (Powell, 1983; Rosen, 1982). They saw the road to advancement largely through a selective higher education system oriented to train more

"experts" to reach the "Modernization" goals. This resulted in competition to enroll the few who would have access to higher education. The competition was fierce and tension mounted over the criteria used to select university entrants: academic performance, family-class origins, or political performance (Unger, 1982).

"Who" will receive a university education became the heart of the division between Party factions. After the revolution, Mao and the CCP decided to give education priority to the children of workers and peasants classes, which in earlier times had been denied schooling. This decision in admission policy was based on the fact that in China educational attainments traditionally had served as important symbols and legitimizers of social status (Unger, 1982). Admission policy in higher education in particular, rested on the party's three fundamental beliefs: family class-origins; political activist performance (support the leadership of the Party and take vigorous action to engage in activities launched by the Chinese Communist Youth League); and academic accomplishment. For Mao and Party radicals, measurements of student's class-background and political activist performance weighted as core elements for higher education admission. On the other hand, for the CCP moderates, student's academic excellence was the question of most importance for higher education enrollment. Table 4.6 demonstrates Unger's (1982) study in which he detailed the Chinese students' family origin designation.

IV.2.7 The Cultural Revolution Debacle

Led by the gradual return of Mao Zedong to public life in 1963, and his sustained criticism of Liu and Deng, the radical faction within the CCP eventually regained power

in 1966, leading to what became the Great Proletarian Cultural Revolution. The central role of higher education in the emergence of the Cultural Revolution is reflected in the fact that one of the symbols of the beginning of the revolution was the display of a poster by a philosophy professor at Beijing University, Nie Yuanzi, on May 25, 1966, a poster that criticized the rector of the university and professors as "anti-party gangsters." Mao Zedong ordered the poster to be disseminated across the country. Then, on May 29, 1966, the first organization of the Red Guards was held at Tsinghua University. The Red Guards were encouraged by Mao to take control over the CCP all over the country.

The revolution particularly targeted intellectuals and it had a devastating impact on higher education, an impact that is still reflected today, as was documented earlier. Tens of thousands of college students joined Red Guard organizations in 1966, and effectively started a movement that led to the effective shut-down of regular higher education institutions in China until the 1970s. When Mao allowed some colleges to operate in 1968, they were modeled along the lines of the principles established earlier, during the Great Leap Forward years. First, they were not allowed to function as institutionalized, formal institutions of higher education. Instead, they were to be aligned with factories or farms, in an integrated teaching/learning process where students would work as well, where college administration would be by worker-peasant-soldier cooperatives, and where faculty would be worker-peasant faculty. As in the late 1950s, factories were encouraged to take over the creation and management of colleges by creating "Workers Colleges." The Shanghai Machine Tools Plant was an example, developing the training of worker-engineers, many of whom received college degrees without having first a secondary diploma (Cheng and Manning 2003).

A second problem that remained even after universities were reopened in the 1970s is that the admissions process was severely twisted towards preference of those who were politically-active or had some ideological distinction. Academic achievement was not one of the priorities. The consequence was that the quality of schooling at the tertiary education level remained low. The isolationism during the Cultural Revolution contributed to this situation.

The Cultural Revolution started in 1966 and although it was declared finished by Mao in 1969, it effectively continued until Mao's death in 1976.

IV.2.8 Post-Mao China: Deng Xiaoping's Regime, Education Policy and National Development

The Cultural Revolution implemented the last Mao and CCP radical educational reform. Deng Xiaoping and his moderate leadership group came to CCP power with Mao's death in 1976 and the defeat of the radical faction. The senior members of this moderate group, particularly Deng Xiaoping, had always preferred a more conventional educational model than Mao.

Table 4.7 illustrates a brief summary from some selected works of Mao (1949-1976) and Deng (1949-1979) and the comparative results of their educational policy. Some Chinese observers believe that Deng's educational policy changes were determined by the needs of economic reform while others think that the changes in educational policy were strictly the result of political changes within the CCP leadership (Shirk, 1979). In reality, both economics and politics had a role to play.

Higher education policy under Deng Xiaoping's leadership has focused on the role of higher education in stimulating scientific technological and economic development. Deng Xiaoping and his associates recognized that major structural reform of the Chinese economy was necessary for China's national development. In 1977 Deng Xiaoping pointed out, "The key issue (for China) to achieve modernization is the development of science and technology." Further, Deng said the leadership, ", must create within the Party an atmosphere of respect for knowledge and respect for trained personnel. The erroneous attitude of not respecting intellectuals must be opposed (Deng, 1977)."

Deng's reforms guided a debate within the CCP on the reevaluation of the pre-Cultural Revolution educational system and the CCP's political policy toward intellectuals. The outcome of the debate contrasted sharply with 1949-1966 CCP radical "two appraisals" view which claimed: 1) in education the bourgeois exercised dictatorship over the proletariat, and 2) the world outlook for the vast majority of intellectuals was bourgeois, that is they were bourgeois intellectuals. The new leadership determined that the principal of the "two appraisals" did not accord with reality, (Deng, 1977). The rehabilitation of the intellectuals and the new line on class coincided with a renewed stress on academic achievement in the schools (Rosen, 1982).

In view of the policy on "setting things right in education" in 1977, Deng Xiaoping and his new leadership decided to open the national university entrance examination. In 1978, the national university entrance examination became based on a merit-based admission policy. Students from the "non-red" proletariat gained opportunity to obtain a higher education. This new higher education admission policy sent out a

message to the outside world and to the whole country that the CCP's new policy on higher education was to b a national development strategy in which the preparation of human capital was the first priority for China's economic reform.

Deng and the new leadership pursued reforms in both economic and education at the same time. After stabilizing power Deng succeeded in having his plans for the urgent modernization of the economy in December 1978. "The Four Modernizations," as the new policy was called, were in agriculture, national defense, science, and technology. Economic progress was placed above the Maoist goals of class struggle and permanent revolution. Profit incentives and economic well-being took the place of ideological doctrines as China's leaders experimented with ways to modernize the nation.

Initially, the Chinese government focused its resources in developing the economic infrastructure, to satisfy the immediate physical capital requirements of the growing industrial powerhouse. This meant an "economy first, education later" strategy. The consequence was the inadequate growth of resources dedicated to education, and to higher education more specifically. The government decided to rely on private sector development to supplement the government resources dedicated to education.

The development of private schools in the post-Mao era is, in general, divided into three stages (Lin, 1999). The first period occurred in the 1978-1987 period, when most private schools were training institutions and night schools targeting second chance students. The second period saw the appearance of private regular schools. And the third period started from 1992, when the first elite school appeared in China, signaling the advent of rapid growth of various types of private schools to the present day (Xu, 2001). In terms of operation, Lin (1999) identified four sources of funds for private schools:

state funds, fees charged to parents, income from operating school businesses, and income from offering extra classes (Lin, J., (1999). Other sources also include equity and short-term bank loans (LaRocque and Jacobeson, 2000). Among these, a significant amount comes from fees charged to parents (Xu, 2001).

Privatization in the field of higher education is a recent and recurrent phenomenon in China. The private education law, promulgated on December 28, 2002, is China's first national legislation on private education. From then on, much has been written about the private ownership and issues on the government managerial authorizations (Yan & Levy (2003) and Yang, (1997). However, one other aspect of the phenomenon of privatization of higher education, namely, quality and quality assurance has attracted little attention. Lin (2005) states that the components of faculty at private universities are: 1) professors being retired from public universities and 2) young undergraduates. While the older faculties work only part time to gain extra income, younger faculties do not have any prior teaching experience (Lin, 2005). In addition, to survive on limited financial resources, many private universities in China employ part-time teachers or senior students from well-known public universities. Furthermore, private universities in China are disadvantaged by a government regulation allowing them to admit students only after public universities have done so. As a result of the regulation, students who enroll in private universities, largely because of low test scores that prevent them to qualify for the public universities (Altbach, 2002).

Although private sector resources have been accounting for an increasing proportion of higher education spending in China, in recent years the government has also provided substantial additional resources to public universities. As showed at the

beginning of this chapter, investments in higher education –as well as in education in general— began to expand drastically in the late 1990s. The government's "9th Five-year Plan" (1996-2000) defined two strategic development goals for higher education: expanding the scale of higher education, and establishing world-class universities (Levin and Xu, 2003). As stated by the government, these goals were motivated by the following considerations: the increasing demand for high level human resources in the country, the need for technological innovations in order to sustain rapid economic growth, and the need for a more developed tertiary education sector that would strengthen the international profile of China as a prominent, technologically-sophisticated nation (Yuan, 2002).

The Tenth Five-Year Plan, for the period of 2001 to 2005, made additional commitments to higher education. In 2002, the Ministry of Education (MOE) announced that China would inject six billion Yuan (731 million US dollars) into higher education and academic research to implement the Plan's goals. The Ministry of Education had as a goal that, by the end of 2005, higher education enrollment would reach 16 million, among which 0.6 million would be graduate students. By 2010, higher education enrollment would reach 23 million with nearly 1 million graduate students (People's Daily, 2002, June 25).

Although the growth of public universities in China has benefited from the rising public-sector support, the reality is that even public universities are relying heavily on the private sector. Mostly, this occurs through the charges in tuition and fees that these universities change their students. Up to 1990, Chinese universities did not charge tuition. After 1990, universities were allowed to charge tuition and fees, and these gradually

increased over time so that currently all students must nominally pay tuition and fees (scholarships and loans, of course, help reduce the burden for parents from low-income families). Tuition and fees are guided by standards established by the Ministry of Education and Provincial Education Bureaus (most universities are managed jointly by these two public sector institutions). In 2002-2003, tuition rates in Beijing ranged from 4,200 to 6,000 yuan, which amounted to $2,360 to $3,375 in US dollars, adjusted for differences in purchasing power across the two countries (Duan 2003).

As can be expected, these tuition and fees constitute a heavy burden for households in China. An investigation by the Chinese National Bureau of Statistics showed that more than half of Chinese residents think that they cannot afford the education payout for its excessive rate of increase. According to the investigation conducted in three big cities, Beijing, Shanghai and Guangzhou, some 54.3 percent of residents regard the speed of price increase in education as being too fast, 26.6 percent of residents regard it reasonable and only 13.1 percent deem it a slow speed (National Bureau of Statistics, 2001). As a result, many Chinese middle-low income families are under heavy financial burdens to send their children's higher education. The gap of ability to pay among different income groups is becoming large and lager with the increase in tuitions (Min, 2001).

In search of cost-effectiveness in managing higher education institutions, the government has abandoned its long-standing centralized control of the sector. The Ministry of Education is still the main agent of governance of higher education. But the direct management of colleges and universities is now a joint venture with Provincial Bureaus of Education. The latter now manage the affairs of most universities, although

the Ministry is still in direct control of a number of institutions. In addition, a process of consolidation of university institutions has taken place, again reversing the long-standing CCP practice of segmenting universities into specialized institutions. A typical example is the merger in September 1998 of Hangzhou University, Zhejiang Agricultural University and Zhejiang Medical University into Zhejiang University. Other major mergers have occurred in Beijing University and Xi An Jiaotong Universities.

IV.2.9 The Open Door Policy and its educational dimension

At the Third Plenum of the Eleventh Congress of the Chinese Communist Party in December 1978, Deng Xiaoping initiated economic reforms with a strategy called the "open door policy." It meant that China would open to the outside world and set free the economy within the country (Gao, 1988). Deng Xiaoping believed it was essential to open the Chinese economy to the outside world, to increase trade and to stimulate foreign investment and technology exchange. The policy encouraged the CCP authorities to recognize the role of private enterprises in economic development, open China's markets to foreign investment, and encourage foreign trade. Within the country, the policy helped the provinces and state owned enterprises to retain much of their earnings for their own development.

Deng Xiaoping also decided to send-to-send Chinese students to foreign countries to study at government expense. In October 1978 he stated, "I support the increase in the number of students going abroad for further study, up to thousands and tens of thousands.

On one hand it serves to raise the standards of our own colleges and universities, and we can learn more about situations and problems in need of solving (Deng, 1983)."

Deng was far-sighted in seeing the possible economic consequences of expanding international trade and realizing the sending students abroad would help China modernize its technology and economy. What he did not emphasize at the time was how the flow of students across boarders would also lead to greater mutual understanding (Levin, 2003).

Seeberg (1998) has observed, "Reform in educational systems has accompanied the economic and political changes throughout the former state-socialist world. The changes have been tailored largely to respond to market needs. In this sense, an important ingredient of Deng Xiaoping's Open Door Policy was an understanding that progress would be promoted by greater openness in education and encouraged students as well as other professionals to be able to engage in academic exchanges with people from other countries and to be able to mobilize themselves into the international education field.

IV.3 Summary and Conclusions

In 2003-2004, China had approximately 17 million students enrolled in institutions of higher education, the highest number of students enrolled in tertiary education in the world. But despite its huge enrollment, the data suggest that, in relative terms, Chinese tertiary education sector is severely under-grown, and perhaps even meager, when compared to other countries at similar levels of income per-capita. China has a tertiary gross enrollment ratio of about 13 percent, which is substantially below the

average for low middle-income countries in general, which had a 21 percent enrollment rate in 2002-2003.

The relatively low tertiary education enrollment rates present in China in recent years are the legacy of the Cultural Revolution and the history of struggles between radical and moderate factions within the Chinese Communist Party in the period from 1949 to 1976. Initially, in the period of 1949 to 1957, China adopted a Soviet model of educational development, consolidating universities into a centrally-planned system with a comprehensive ideo-political curriculum under strong, centralized direction. Then, in the late 1950s and especially during the Cultural Revolution period (1966 to 1976), anti-intellectualism, a focus on practical (vocational) education, and an emphasis on education for the masses (at a basic level) led to the literal disappearance of tertiary education. Only after the death of Mao Zedong in 1976, and with the predominance of the economic and education reform policies of Deng Xiaoping did higher education gain more prominence.

The rise of government spending on tertiary education has been mainly the result of the rapid economic growth in China, and the associated rising government revenues. But as a fraction of GDP, government spending on tertiary education in China has lied below comparable levels in other countries. Private sector spending —in terms of private universities, but mostly in the form of tuition and fees charged by public universities— has helped raise total spending on higher education. There has also been a sharp move by the government since 1998 to provide greater resources for higher education in China's development drive.

Indeed. China has made a great leap forward in higher education. This has resulted in sharply-rising enrollment rates as well as rising ratios of government spending relative to GDP.

International Trade in higher education services is one of the key government policies intended to stimulate what was until 10-15 years ago a moribund higher education sector. The next chapter focuses on the developments in —and potential consequences of— trade in higher education services for China.

Table 4.1 Gross Enrollment Ratios in Selected Countries, 2002-2003

Country 2003	Per-Capita Income, 2003	Tertiary Gross Enrollment Rate,
Nicaragua	$3,180	18%
Indonesia	$3,210	15%
Ecuador	$3,440	20%
Armenia	$3,790	28%
Jamaica	$3,800	17%
Egypt	$3,940	33%
Jordan	$4,290	31%
Philippines	$4,640	31%
Venezuela	$4,750	40%
Lebanon	$4,840	44%
El Salvador	$4,910	17%
China	**$4,980**	**13%**
Peru	$5,080	32%
Ukraine	$5,430	62%
Russian Federation	$8,950	70%
All Lower Middle Income	$5,500	21%
United States	$37,750	81%

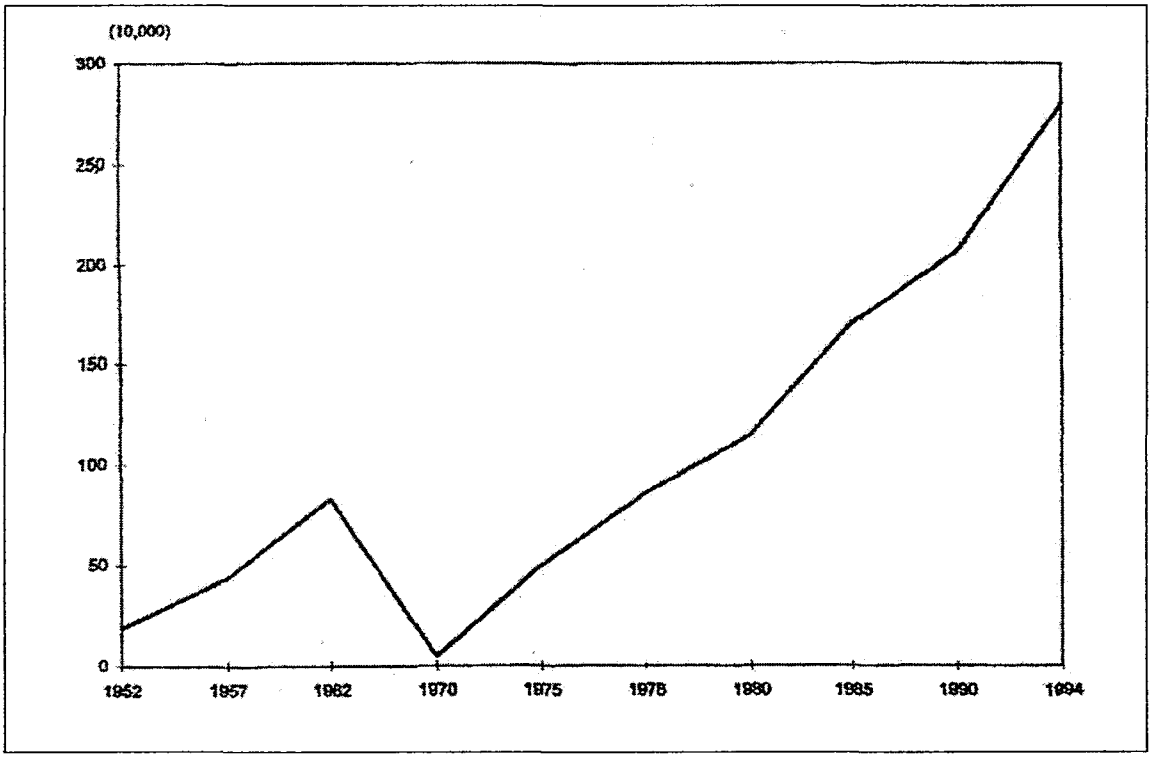
Source: World Bank, *World Development Indicators*, 2005.

Table 4.2 Number of Students Enrolled in Tertiary Education, China

Year Institutions	Number of Students Enrolled in Tertiary Education
1980-1981	1,662,792
1985-1986	3,515,485
1990-1991	3,822,371
1994-1995	5,621,543
1999-2000	12,143,723
2002-2003	15,186,217

Source: UNESCO, *World Education Digest and Statistical Yearbook*, various years.

Figure 2: Enrollment in regular higher education institutions, 1952-1994



Source: The World Bank (1997) country study report: China higher education reform (pp.2).

Table 4.3 Government Education Spending in China and Other Countries, 1999

Country	Total Public Spending As % of GDP	Tertiary Public Spending as % of GDP
China	**2.0%**	**0.5%**
Argentina	4.5	0.8
Brazil	5.1	1.1
Chile	4.1	0.6
Jamaica	6.3	1.2
Jordan	5.0	1.0
Malaysia	5.0	1.2
Peru	3.3	0.7
Philippines	4.2	0.7
Thailand	4.5	0.9
All Developing Countries In Sample	4.3	0.9
OECD Average	4.9	1.0

Source: OECD (2002).

Table 4.4 Overall (Public Plus Private) Tertiary Sector Spending as a Percentage of GDP (Selected Countries)

Country	Total Tertiary Education Spending as % of GDP
China	**0.8%**
Argentina	1.1
Brazil	1.1
Chile	2.2
Jamaica	1.7
Jordan	1.9
Malaysia	1.3
Peru	1.2
Thailand	1.1
All Developing Countries In Sample	1.2
OECD Average	1.3

Source: OECD (2002).

Table 4.5 Teaching Hours of Marxist Theory Programs at Chinese Higher Education Institutions in 1952

	On new Democracy	Foundations of Marxism & Leninism	Political Economy	Dialectical & Historical Materialism	Total Teaching Hours
Comprehensive & teachers training universities	100	136	136	100	472
Specialized institutions	100	136	136		372
Three-year specialized colleges	100	136	136		372
Two-year specialized colleges	100	136	136		372
One-year training programs	100				100

Source: China Education Yearbook Editorial Committee, 1984

Table 4.6 Class Origin Designations during Mao Era (1949-1976)

Good-class origins (it was also referred to as "five red kinds" in Chinese. These five are in two broad categories:	Middle-class origins	Bad-class origins
(a) Politically red inheritances (the families headed by pre-liberation Party members, plus the orphans of men who died in the revolutionary wars); (1) Revolutionary cadres (2) Revolutionary army men and (3) Revolutionary martyrs (b) Working-class: (4) Pre-liberation industrial workers and their families (5) Former poor and lower-middle peasant families	(a) Non-intelligentsia middle class: Families of pre-liberation peddlers and store clerks, et. Former middle-peasant families (b) Intelligentsia middle class: Families of pre-liberation clerks, teachers, professionals, etc.	Families of former capitalists *Families of "Rights" (the label denoting those who criticized the Party and Mao in the Hundred Flowers Campaign of 1957) Pre-liberation rich-peasant families *Families of "bad elements" (a label denoting "criminal" offenders) Pre-liberation Landlord families *Families of counter-revolutionaries

*Since these particular "class" labels were not derived from prior economic standing but from the family head's political or criminal errors, such students' "class label" had a special complexity. E.g., the son of a "rightist" of proletarian origins was of a better "bad-class" status than the son of a "right" of bourgeois origins (Unger, 1982. pp. 14).

Table 4.7 Differences between Mao and Deng on Education Policies

Mao Zedong thoughts	policy on education	Deng Xiaoping thoughts	policy on education
1957/02/27 Our state is a people's democratic dictatorship led by the working class and based on the worker-peasant alliance. What is this dictatorship for? Its first function is internal, namely, to suppress the reactionary classes and elements and those exploiters who resist the socialist revolution, to suppress those who try to wreck our socialist construction, or in other words, to resolve the contradictions between ourselves and the internal enemy. Pp366 In socialist society the basic contradictions are still those between the relations of production and the productive forces and between the superstructure and the economic base. Pp.373 Today, matters stand as follows. The large-scale, turbulent class struggles of the masses characteristic of times of revolution have in the main come to an end, but class struggle is by no means entirely over. Pp.375. The several million intellectuals who worked for the old society have come to serve the new society, and the question that now arises is how they can fit in with the needs of the new society and how we can help them to do so. Pp.385 **1957/oct/9** The proletariat cannot build socialism without its own vast contingent of technicians and theoretical workers. We should form a contingent of proletarian intellectuals within the next ten	Remolding of the intellectuals. <u>Admission policy on higher education:</u> Class-origin policy	**1957/July/9 "Run our schools well and train carders"** As for the material benefits of teachers, at present it would be very difficult to raise the salary of each and every one of them, but we should raise the salaries of truly capable professors, associate professors, senior engineers, senior doctors and senior specialists in other fields of endeavor. Such people cannot be numerous, perhaps numbering only about ten thousand in the country as a whole. Excerpt from a speech delivered during a discussion of educational work at the 221st Government Affairs Meeting of the Government Administration Council.) **1958/Apr/7 "Education should be made universal and educational standards raised"** At this meeting we should concentrate on discussing the question of primary and secondary schools. On the whole, efforts to make education universal and eliminate illiteracy are proceeding well, the work-study programmed is being carried out vigorously and vocational secondary schools are developing rapidly. These are all good things which have only come about in the past few years. We should now review our experience, make appropriate adjustment and solve the problems which have arisen. Making education universal and raising educational standards are the main issues needing to be addressed in the field of education. Our policy in this	Respect for knowledge and respect for trained personnel. <u>Admission policy on higher education:</u> Academic-merit policy

years (the plans for the development of science also cover twelve years, and there are still ten years left). Our Party members and non-Party activists should all strive to become proletarian intellectuals. Plans for training proletarian intellectuals should be worked out at all levels, particularly at the three levels of province, prefecture and county, or else time will have passed with no such people trained. An old Chinese saying goes, "It takes ten years to grow trees but a hundred years to rear people." Let's subtract ninety from the hundred years and rear people in ten. It's not true that it takes ten years to grow trees, since it takes twenty-five years in the south and even longer in the north. But it is quite possible to bring up people in ten years. We have had eight years and if we add ten, we will have had eighteen years; it can be expected that by then a contingent of working-class experts with Marxist ideology will have basically been formed. After that for another ten years the task will be to enlarge this contingent and raise its level. Pp.472 **1957/0ct/13** What is the scope of the socialist revolution, what classes are involved in this struggle? The socialist revolution is a struggle waged by the proletariat at the head of the working people against the bourgeoisie. Pp.483. The proletariat must build up its own army of intellectuals, just as the bourgeoisie does. The regime of a given class cannot do without its own intellectuals. How could bourgeois dictatorship be possible in the United States without its intellectuals? Ours is a dictatorship of the proletariat, and the proletariat must build its own army of intellectuals, including all		regard is that education should be made universal and educational standards raised and that we should not overemphasize one to the neglect of the other. If we only make education universal without raising educational standards, our science and culture cannot progress rapidly. I **1977/May/24 "Respect knowledge, respect trained personnel"** The key to achieving modernization is the development of science and technology. And unless we pay special attention to education, it will be impossible to develop science and technology. Empty talk will get our modernization program nowhere; we must have knowledge and trained personnel. Without them, how can we develop our science and technology? ... We must recognize our backwardness, because only such recognition offers hope. **1977/Sept/19 "Setting things right in education"** We should have two main criteria for admitting college students: first, good conduct; and second, a good academic record. **1978/Mar/18 "Speech at the opening ceremony of the national conference on science"** The key to the four modernizations is the modernization of science and technology. ...The first point is the necessity of understanding that science and technology are part of the productive forces. We must carry out the Party's policy on education comprehensively and correctly,	

those intellectuals from the old society who truly take a firm working-class stand after being remoulded. Probably Chang Nai-chi can be counted among those Rightists who refuse to change. Pp.489.		put it on the right track and introduce appropriate reforms, so as to ensure both quantitative and qualitative progress.	

Sources: Selected readings from the works of Mao Zedong, Beijing Foreign Language Press 1977. Selected readings from the works of Deng Xiaoping Education Theory, Beijing People's Daily Press 1999 (Chinese language).

CHAPTER V

TRADE IN HIGHER EDUCATION, ECONOMIC GROWTH AND THE IMPACT OF THE WTO/GATS LIBERALIZATION

The last chapter provided an analysis of the current status of higher education in China and its history. This chapter provides a survey of the academic literature on the role of higher education on the development process and, more specifically, on the impact of the liberalization of international trade in higher education services on economic development.

The chapter begins with a discussion of the determinants of economic growth and the role played by education and, in particular, higher education. It is shown how education has come to be regarded as a necessary but not sufficient factor for accelerated economic growth. The chapter then turns to examining the links between international trade and economic growth, including the role of trade in higher education services. The potential gains and costs of trade are discussed.

The chapter concludes with a comprehensive discussion of the liberalization of international trade in higher education services in China, focusing on the role played –and potential impact of—the WTO/GATS process. This part of the chapter provides some

background on China's recent history regarding international trade liberalization. It then describes the rationale, operational process and actual context of the Chinese government's commitments to WTO/GATS trade in higher education. It explores the potential benefits of and costs of trade liberalization in higher education within the terms of GATS.

V.1The Impact of Education on Economic Growth

Traditionally, mainstream economics considered the accumulation of physical capital as the key to economic growth. Based on the experience of the industrial revolution, the analysis of Solow (1956, 1957) suggested that increased amounts of physical capital per worker increase worker productivity, raising per-capita income and the standard of living. The conclusion was that incentives to —and government policies fostering— increased savings and investment in physical capital were the key to the development process. A similar conclusion was arrived at in centrally planned economies, such as the Soviet Union, where a push towards industrialization was seen as the way for socialist economic progress.

In the 1960s, the work of a number of prominent labor economists gave rise to questions about the mainstream approach's failure to consider schooling and human capital as a factor in economic growth. The research of Becker (1964) indicated that human capital was essential in raising worker productivity. The research of Schultz (1961) indicated that in both developing countries and industrialized economies, a more

educated workforce increased agricultural productivity. As a result, there was a growing perception among economists that investing in education and increasing the supply of skilled labor was essential in the process of economic development.

It was in the 1990s that human capital was more fully incorporated into the theory of economic growth. Up to that point, the focus had been on how educated workers —engineers, doctors, layers, etc. — contribute directly to the productivity of agriculture, manufacturing and services, as workers in those sectors. In the early 1990s, economic research also began to incorporate into growth theory the role played by scientists and innovators in promoting technical change (Romer, 1990). New products and techniques raise worker productivity and countries that have higher rates of technological progress can therefore be expected to grow at faster rates. Greater educational attainment – especially in the form of highly educated scientists, entrepreneurs and innovators—is connected to technological advances and should be, according to this theoretical research, a significant force on economic development.

Many economists have studied empirically how increased schooling affects economic growth (Rivera-Batiz, 2004). The initial research in this area indicated that, in some industrialized countries, education could indeed explain a large part of economic growth. In the case of the United States, the work of Denison 1967; 1985; Griliches 1970; and Jorgenson 1995) showed that the growth of human capital could account for between 10 and 50 percent of the growth of income since 1929, depending on the precise period considered. Jorgenson and Fraumeni (1995) found that skilled labor accounted for 34.5 percent of the growth of U.S. income between 1948 and 1960, 41.6 percent between 1960 and 1969, 46.3 percent between 1970 and 1979, and 12.1 percent since 1979. Recent

research for European countries also finds education as a major factor explaining the economic growth of European countries from 1960 to 2000 (De la Fuente, 2002).

But empirical evidence on the role of human capital on the growth experience of developing countries is much more diverse than that obtained for the industrialized countries. Some research does find that human capital has been a major force in the development process and explains the substantial economic growth of some developing countries, such as the East Asian economies (Mankiw, Romer and Weil 1992; Lau, Liu and Rivkin 1993; Krueger and Lindahl 2001; and Rivera-Batiz 2004). But some recent research does not find any evidence of a positive impact of education on the economic growth of many countries (Pritchett, 2001; Easterly and Levine 2001). These economists have asked, for example, how it is possible that levels of schooling have increased so much in some countries while their growth experience has been dismal. Many countries in the former Soviet Union, for instance, have among the highest levels of schooling in the world. Yet, their economic growth has stagnated for many decades. World Bank economist Lant Pritchett concludes that "For LDCs as a whole the basic story line about education just does not scan. Two basic facts are well known. Enrollment rates in LDCs have increased dramatically in the last 30 years...However, the second well-known fact is that, on average, growth rates of LDCs have been stagnant, or even falling, over time and are lower than those for developed countries" (Pritchett, 2001).

It can be concluded from this literature that in some developing countries, such as the East Asian economies of Hong Kong, China, South Korea, Taiwan, China, and Singapore, among others, education explains a large share of their success. But in other countries, investments in education have not produced high rates of economic growth.

One of the explanations for the variation in the experiences regarding the effectiveness of investments in human capital is the role of the quality of that education. Many governments have invested heavily in mass education while ignoring the quality of those educational institutions. More students may be getting diplomas or degrees, but their knowledge and learning is limited because of the lower quality of the schools and universities that they graduate from. The lower quality associated with increased enrollments may be the outcome of larger class sizes, lower expenditures per student on textbooks and class materials, or other factors, but in these cases increased quantity of schooling may be associated with reduced quality of schooling, leaving worker productivity unchanged.

Recent empirical work finds that both quantity and quality of schooling are important for economic growth. Eric A. Hanushek and Dennis Kimko (1996; 2000) provide a cross-country econometric study of how quantity and quality of schooling are related to economic growth. They measure quality of schooling by means of international student assessment carried out by PISA and TIMMS, among others. Their conclusion is: "Quality has a consistent, stable, and strong influence on economic growth. Across a wide variety of specifications... the impact of quality indicates that one standard deviation in mathematics and science skills translates into one percentage point in average annual real growth. This growth effect is larger than would be obtained from over eight years in average schooling." (Hanushek and Kimko 1996, p. 34).

But there is more to the lack of impact of education on the economic growth of some developing countries, particularly when one considers the role played by higher education on growth. The positive effects of investments on higher education are

predicated on the assumption that the university graduates do gain employment after they are done. The fact is that unemployed skilled workers do not contribute that much to national income. Therefore, economies that provide employment to skilled workers, that is, where the demand for skilled labor is rising, will profit from increased investments in higher education, but in countries that have sluggish demand for skilled labor, investments in higher education can fail. Also, economies with dynamic, diverse production structures can gainfully employ university graduates, reaping stronger growth effects than economies that have difficulties absorbing the highly-skilled. While East Asian economies have been successful in utilizing their college and university graduates, other countries that have expanded their higher education systems, such as Jordan, Egypt and the Philippines, find themselves with high unemployment rates among college graduates.

A final aspect regarding the impact of investments in higher education on economic growth relates to the sector of employment of those university graduates who do find work. Traditionally, the assumption was that that these workers would be employed in productive jobs. But this may not be the case. As Rivera-Batiz (2004) notes: "A Ph.D. in physics who only finds employment as a taxi driver is not more productive to the economy than a taxicab driver with an elementary school diploma." In countries where the expansion of higher education has not been associated with increased economic growth, one also finds the under-employment of college graduates.

Sometimes, the under-employment may be in bloated and unproductive government bureaucracies. Data for the mid-1990s shows that in Egypt and the Ivory Coast, between 50 and 70 percent of all graduates from higher education institutions had

been hired by the public sector or public corporations (Gersovitz and Paxton 1996; and Pritchett 2001). And this factor may lie behind the failure of many centrally-planned economies to show significantly positive effects of their huge investments in higher education. Of course, employment in efficient government bureaucracies has a high indirect productivity for the economy, in the form of improved governance of its social and economic affairs. But in developing countries where poor governance and corruption prevail, the absorption of the best-educated into public service may be a waste of resources. Their knowledge and learning is instead employed in low-productivity, rent-seeking activities, where they seek to take advantage of their hard-to-obtain government jobs through various means. If a large portion of graduates from higher-education institutions end-up in purely rent-seeking activities, their impact on economic development may be negative, not positive. In fact, they may become a barrier to economic development (Murphy, Schleifer and Vishny 1991).

In examining which factors may facilitate or foster the productive use of graduates from higher education institutions, a number of economists have been arguing that international trade may be one of the most important forces. The next section examines this controversial issue.

V.2 International Trade, Higher Education and Economic Growth

The role of international trade on economic growth has been a controversial issue that has raged for centuries. Advocates of international trade have argued that the gains

from trade for a country are large and unequivocal. They suggest that for economic growth to be stimulated, countries must lower their tariff and non-tariff barriers to international trade. Mostly, the basis for the gains from trade originate in the Ricardian argument that, by specializing in producing goods and services in which a country has a comparative advantage, countries can out-perform foreign competitors and profit from exporting these products, while at the same time buying cheap imports from other countries, which would otherwise be comparatively expensive to produce locally.

Opponents of globalization argue that the specialization and production adjustment shifts required by comparative advantage impose a heavy burden on the liberalizing countries. Domestic producers in a range of sectors will not be able to compete with foreign producers and they must go out of business. Although some of the labor force displaced by trade may be employed in export and other sectors, this may take a long period of time. They argue that, empirically, the gains from such trade are not large enough to compensate for the adjustment costs imposed on some sectors of society by trade.

In most cases, both proponents and opponents of trade have made correct arguments. International trade in goods and services has both costs and benefits. As Joseph Stiglitz (2002, p. 5) argues: "Even when there are negative sides to globalization, there are often benefits. Opening up the Jamaican milk market to U.S. imports in 1992 may have hurt local dairy farmers but it also meant poor children could get milk more cheaply. New foreign firms may hurt protected state-owned enterprises but they can also lead to the introduction of new technologies, access to new markets and the creation of new industries."

The basic question is whether the gains from trade in goods and services exceed the costs of trade. The answer to this question is complex. In some cases, international trade has failed to produce any major improvements in economic growth. In other cases, trade liberalization has been connected to enormous improvements in the standard of living. But what appears to be behind these different experiences is the fact that international trade is not necessarily have a strong positive impact on economic growth unless countries have other conditions that complement the impact of international trade.

In this sense, examining the situation of the fast-growing East Asian economies mentioned earlier (Korea, Taiwan,China, Hong Kong, China, Singapore, etc.) is essential. These countries relied on the opening of their economies to trade as one of their key policy reforms. As a result, exports expanded rapidly. In the Republic of Korea, the ratio of exports to GDP rose from 9 percent in 1960 to over 35 percent in the early 1980s. In Taiwan, China the ratio of exports to GDP increased from 10 percent in 1960 to over 50 percent in the 1980s. It is, of course, during these years when the income per capita of both of these economies grew at a rate of close to 6 percent. Similar observations can be made of Singapore, Hong Kong, and Malaysia, as well (Young, 1995).

The close connection between trade and growth in the fast-growing East Asian countries led many proponents of trade to conclude that trade liberalization was the key to growth in these countries. This is indeed the view of the World Bank publication: *The East Asian Miracle: Economic Growth and Public Policy, which* concludes: "The export-push strategy appears to hold great promise for other developing countries. Creating a free trade environment for exporters, providing finance and support services for small and medium-sized exporters, improving trade-related aspects of the civil service,

aggressively courting export-oriented direct foreign investment, and focusing infrastructure on areas that encourage exports are all attainable goals" (World Bank, 1993, p.25).

But a number of recent studies suggest that in the East Asian countries, it was the combination of (1) investments in physical and human capital, and (2) improved public sector governance –alongside the trade liberalization—that allowed the economies to grow quickly (Rodrik 1995; Wacziarg and Horn 2003). The investments in human and physical capital were complementary to the trade liberalization. They allowed the private sector to have available ample resources with which competitive export industries could be built. Without such resources, the trade liberalization might have provided incentives for exports to grow, but very little real economic activity would have occurred since the resources would not have been available to create new firms and industries. At the same time, investments in physical capital and in education –particularly those in higher education— become more productive in open economies, where the discipline of producing for exports forces domestic producers to innovate and/or adapt foreign technologies that can give them a competitive edge in world markets. Trade liberalization and investments in higher education are thus complementary to each other (Gylfason, 2004). When investments in one of these areas are made without any significant effort attached to the others, their impact on growth appears to diminish.

It can be concluded from this discussion that the liberalization of international trade in goods and services can have –if combined with the appropriate education, investment and governance policies—a substantial positive impact on economic growth. Since the mid-1990s, the organization that has had the lead role in promoting and

fostering world trade liberalization has been the World Trade Organization (WTO). The next section examines the WTO and its role in the liberalization of trade in goods and services, including higher education services.

V.3 The World Trade Organization (WTO) and the General Agreement on Trade in Services (GATS)

International trade in post secondary educational services has grown substantially in recent years. One of the institutions most closely related to the liberalization of trade in higher education services is the World Trade Organization (WTO). The WTO was created in January 1995 to replace the General Agreement on Tariffs and Trade (GATT). The GATT was itself created in 1947 as an institution in charge of promoting world trade in the aftermath of World War II. From 1947 through 1994, the GATT operated through rounds of negotiations that, through the years, led to a number of multi-lateral agreements between countries that reduced barriers to international trade. The most productive of these rounds was the Uruguay Round, which began in 1986 and ended in 1994. The major reduction in barriers to trade promoted by the Uruguay Round is partly behind the accelerated globalization of the last 20 years.

The WTO was placed in charge of supervising the GATT's multilateral agreements as well as to continue the process of international trade liberalization, particularly in the area of services. The WTO is organized as an organization of 148 member countries. Although the daily management of the organization occurs through

the actions of country representatives located in Geneva, most major decisions of the organization are taken in Ministerial meetings where representatives of member countries meet. These occur every two years. The last conference was held in Cancun, Mexico in September 10-14, 2003. The next one will be held in Hong Kong in December 2005.

Since its inception in 1995, the WTO has been in charge of an intense process of liberalizing international trade in services. This sector is the largest in most economies of the world. In the United States, services account for 75 percent of Gross Domestic Product (GDP) and in developing countries in general, services represent close to 60 percent of GDP (World Bank 1997). In China, services represent 57 percent of GDP.

Service sectors —banking, insurance, transportation, higher education, etc.— have traditionally been subject to heavy barriers to international trade and investment, as was discussed in chapter 3. The process of multi-lateral negotiations that led to GATT and WTO also included the liberalization of international trade in services and it led to the General Agreement on Trade in Services, GATS. The General Agreement on Trade and Services (GATS) is a multilateral agreement whose purpose is to provide legally enforceable international rights to trade in all services by removing many of the existing barriers; including those in education (WTO, 2000).

The GATS agreement began the process of trade liberalization in services, but it was not nearly as comprehensive as the agreements in the area of trade in goods. As a result, the WTO was also entrusted with the mission of continuing negotiations to further liberalize trade in services under the umbrella of the GATS agreement. In January 2000, a new round of negotiations started with the goal of increased liberalization of trade in services.

Trade in educational services, as defined in the GATS agreement, is based on 5 sub-sectors of education as categorized by the United Nations Provisional Central Product Classification (CPC). These sub-sectors, as detailed in Table 5.1, are: primary education, secondary education, higher education, adult education and other education. As Table 5.1 shows, higher education includes regular tertiary education institutions as well as post-secondary technical and vocational education services as well as other higher education institutions covering education for adults outside the regular education system (UNESCO, 2002).

As part of the GATT agreement in 1995, 44 member countries of the World Trade Organization (WTO) already agreed to liberalize at least one sector of their education systems. Of these countries, half have made commitments with regard to at least four of the five sectors identified in the GATS classification and 21 included higher education (Education International, 2002). In 1996, GATS formally extended its classification of services to include educational services, in particular, higher education. Trade in education is now classified as one of 16 service sectors, similar to such services as banking, communication services, recognized in the GATS (WTO, 1994).

In 2002, the United States together with New Zealand, Japan and Australia , submitted a negotiating proposal to the WTO to reiterate the critical role of government control over education policy, but at the same time asserting the importance of reducing trade barriers in this area, suggesting the need to ensure increased market access in higher education, training and testing services. These current WTO negotiations regarding GATS are the most pressing international issue relating to the globalization of education.

The implications of GATS are potentially enormous and probably quite different for different countries. The inclusion of the education sector in the GATS negotiations has led to serious divisions among countries, particularly between developing countries and industrialized nations. Points of contention include: fear from educational stakeholders in many developing countries that international competition would negatively affect their local educational institutions, that it would lead national governments to abandon their social spending on education, and that it would have a negative impact on the sovereignty of the people (Larsen, 2002).

In the Asia region, counties such as Australia and New Zealand have made heavy commitments in relation to the liberalization of their higher education market to international trade, with the goal of expanding their exports by attracting more international students and increasing their share of what they see as a world market for higher education. On the other hand, other countries within the region have mixed views on GATS, influenced by such factors as their traditions about the role of public and private sectors in higher education, the extent to which they are already involved in export education and their future ambitions, their past experience with foreign education providers, and the extent to which students already study abroad and foreign students enter their own local universities.

Although, as noted earlier, many higher education stakeholders are concerned about the potentially negative effects of foreign competition on local colleges and universities, many developing country governments face strong economic pressures to liberalize this sector. Expanding tertiary sector enrollments have put heavy financial pressures on developing country governments, which are seeking alternative sources of

supply. Although privatization has been used as a policy move in some countries to supplement public funding of higher education, the domestic higher education sector in many developing countries often does not have the resources, expertise or experience to provide high-quality higher education services. Foreign suppliers are seen as an attractive alternative for many governments in increasing both the quantity and quality of higher education services in their countries.

But not all countries are expecting to become importers. For Asian countries that have had expanding higher education sectors, such as South Korea, Malaysia and Singapore, there is a potential to become exporters of higher education services. In the case of China, there is potential for both exports and imports of higher education services. The next section examines the Chinese case, discussing the potential impact of the WTO/GATS.

V.4 The WTO/GATS and Trade in Higher Education Services: The Case of China

China applied for the World Trade Organization (WTO) membership in 1987. On December 11, 2002, China became a formal member of the WTO. It had taken China 15 years of tough negotiations to achieve accession to the WTO. What are the motives of the Chinese government and what objectives is it pursuing with the WTO accession? To understand the rationale of China and its relationship with the World Trade Organization, one has to look at China's history in the world economy as well as its present achievements in the global economy and its intended future. In this section, the focus is on a brief review of modern China—1949 to the present.

V.4.1 China's International Trade Policies: A Brief History

In regard to China's world trade policy, the Communist Party leaders taking power in 1949 feared that maintaining openness to foreign trade would repeat the consequences of the opening up of China to trade and investment in the nineteenth century, which they considered to have been a disaster, leading to the impoverishment of the masses and the dismemberment of the Chinese nation-state (Davies, 2000). The Communist Party, therefore, wanted only limited economic relationships with the capitalist world. The country's isolation was also precipitated by the Korean conflict, which resulted in a United Nations trade embargo against China. In 1951, the United Nations declared China to be an aggressor in Korea and sanctioned a global embargo on the shipment of arms and war materiel to China. This step signaled the beginning of a total break in economic linkages between the West and the new People's Republic of China.

In the first half of the 1950s, China maintained economic linkages with the Soviet Union, as its model of development followed the Soviet experience. However, in practical terms, Mao much resented the over-reliance on Moscow as a model for China. During the second half of the 1950s, Mao began to question publicly the applicability of the Soviet model for China. The Sino-Soviet relationship broke up in 1959 and the repatriation of Soviet experts marked the start of a period when China became even more intensively isolated from the world trading system.

The 1960s and early 1970s saw intensification in the implementation of Mao's beliefs in self-sufficient economic development, not only at the national level but also at the regional and provincial levels, even within the enterprise. Internationally, this policy kept China away from participation in the global economy just at the time when other East Asian economies, including Hong Kong and the province of Taipei, were displaying rapid progress in technological development and economic growth under export-oriented policies.

In 1971, China's re-entry into the United Nations ended the history of trade embargo but did not promote automatically China's integration into the global economy. It was only after Mao's death in 1976, and the rise to power of Deng Xiaoping that the Communist Party started the reforms that led the change in the Chinese economic system from a central planned system to a market economy. As part of these reforms, it was the Party's decision to open doors and integrate China's economy with the world economy (Burns, 1999). Accordingly, China's international trade grew rapidly, from less than US $7.5bn in 1975, to US$38bn in 1980, nearly US$70bn in 1985, and US$115bn in 1990 (Davies, 2000).

China's market economic reforms qualified the country for membership in a number of international economic organizations. The country became an observer of the General Agreement on Tariffs and Trade (GATT) in 1982 and formally applied for full GATT membership in July 1986. The GATT formed a working committee in March 1987 to examine China's application to GATT and to negotiate the terms of agreement to the agreement. After years of negotiations, on November 2001, at the Ministerial conference at Doha, Qatar, WTO members officially approved an agreement with China

on its accession to the organization (China's WTO Accession, WS 2000/2001). After experiencing a long time of international isolation, China had finally fully reemerged as part of the world trade regime.

V.4.2 China's WTO Accession Commitments

China's comparative advantage in world trade has lied traditionally in the production of low-cost, labor-intensive manufactured goods and this became the main sector of trade after market reforms. Since 1980, merchandise exports of China have grown at a remarkable annual rate of 14 percent. Only a few other countries (mainly Korea, Mexico and the Philippines) have had similar rates of export growth. China's merchandise exports virtually exploded in the 1990s, rising from a value of $62 billion in 1990 to $437 billion in 2003 (World Bank 2005).

Although not at the same volume as merchandise exports, Chinese service exports have been catching up, rising at a high rate as well in the last 10 years. In 1990, China's exports of services were only $6 billion, but by 2003, they had risen to $46 billion. At the same time, China has been importing massive amounts of services. In 1990, the value of the imports of services of China was $4 billion, but this had risen to $55 billion by 2003. China thus had a trade in services deficit in 2003.

Trade in services was a key area in China's WTO accession negotiation, and China's commitments in this area represent perhaps the most extensive liberalization of services trade ever undertaken by GATT or the WTO (Mattoo, 2002). Upon obtaining

WTO membership, China was required to open its services market under the General Agreement on Trade in Service (GATS), discussed in the next section.

V.4.3 China and the GATS Liberalization of Trade in Services

As noted earlier, GATS constitutes the first set of multilateral rules covering international trade in services. Table 5.2 shows the key aspects of the GATS agreement. The range of services under the supervision of GATS is extremely broad, including 12 service sectors: 1) business; 2) communication; 3) construction; 4) engineering; 5)distribution; 6) education; 7) environment; 8) financial; 9) health; 10) tourism 11) travel; and 12) recreation (GATS: Objectives, Coverage and Disciplines). The agreement defines trade in services as the supply of a service through any of four modes (UNESCO, 2002):

i. Consumption abroad of service by consumers traveling to supplier country (such as tourists);
ii. Cross border supply of a service to consumer country without the supplier moving (such as outsourcing);
iii. Commercial presence of a supplier in consumer country (as when an American supplier of a service moves to China); and
iv. Presence of Natural Persons from supplying country in consuming country (e.g. professors, researchers working outside their home country).

The detailed agreement encompassed by GATS has three parts. The first part is the framework that contains the general principles and rules of the agreement. The second part consists of the national schedules that list a country's specific commitments to access to their domestic market by foreign providers. The third part consists of Appendixes

which detail specific limitations for each sector that can be attached to the schedule of commitments (WTO, 1999).

Certain GATS obligations apply across the board, while others depend on the sector-specific commitments assumed by individual Member state. The most important of the general obligations under GATS are transparency and the most-favored-nation (MFN) principle. The transparency obligations require, among other things, that each member publish promptly "all relevant measures of general application" (this is, measures other than those involving only individual service suppliers) to trade in services. The MFN obligation prevents members from discriminating among their trading partners. The agreement, however, permits members to list temporary exemptions to MFN status.

The sector-specific commitments made by each GATS member in the services market are based on two basic conditions: *national treatment*, in which the country commits itself to treat foreign suppliers in the same way as national suppliers, and *market access*, in which a country commits itself not to impose unreasonable or disproportionate burdens on foreign companies which would foreclose their access to the domestic market (GATS, 2000).

In joining the WTO and GATS, China made substantial commitments regarding national treatment and market access in the area of services, but many of these commitments are phased-in over time and do not apply to all service sectors. In fact, the number of sectors with guaranteed unrestricted access is smaller than in most other countries (Bhattasali; Li and Martin, 2002). Figure 3 compares China's services commitments for each mode listed above with those of industrial, developing, and acceding countries. On consumption (mode 2), commercial presence (mode 3), and the

presence of natural persons (mode 4), China has made at least partial commitments in all the sectors, and on cross-border supply (mode 1) for over 80 percent of the sectors. This situation compares favorably with the commitments of all other country groups. However, the number of sectors with a guarantee of full access in China's schedule today is less than those for the other country groups, with a very significant difference for mode 3 (Matto, 2004).

V.4.4 China's Commitments to the WTO/GATS in Trade in Higher Education Services

International trade in higher education services has grown substantially over the past decade. The range of trade in higher education services is quite broad. Table 5.3 presents the main areas, as defined by GATS (briefly discussed in earlier chapters). An estimate given by Global Alliance for Transnational Education shows that about 27 billion dollars worth of higher education services was being exported to Asian and Pacific states in 2001 by three countries only, namely the United States of America, the United Kingdom and Australia. The OECD puts the current global market for educational services at about $30 billion, which is only slightly less than the worldwide market for financial services (Ashfak, 2003).

International trade in higher education services is part of a broader process of transformation of educational institutions, as they become part of the globalization process that has already enveloped most other industries. Major international institutions and organizations, including the World Bank, UN, and OECD among others, have been

gradually recognizing this growing globalization process in education. The OECD, which has been at the forefront of research on trade in higher education services, refers to it as "cross-border education". According to the OECD definition, cross-border education refers to situations where the teacher, student, program, institution/provider or course materials cross national jurisdictional border (OECD, 2004). Three signs reflect the growing significance of cross-border education: 1) the exponential rise of international student mobility, 2) the development of new forms of long-distance educational service provision, and 3) the emergence of new cross-border players in the education sector (Larsen and Vincent-Lancrin, 2002).

UNESCO has also become interested in the internationalization of educational institutions. UNESCO refers to it as transnational education. According to the UNESCO-CEPES (Council of Europe)-Code of Good Practice, transnational education includes: "All types of higher education study programs, or sets of courses of study, or educational services (including those of distance education) in which the learners are located in a country different from the one where the awarding institution is based. Such programs may belong to the education system of a State different from State in which it operates, or may operate independently of any national education system."

Transnational or Cross-Border education has several main forms (Machados 2000; Kauffman 2001):

> *Franchising:* The process whereby a higher education institution from a certain country offers a course or program through another institution located in a different country.
>
> *Branch campus:* established by a higher education institution from one country in another country in order to offer its own degrees in that other country.

Program articulation or twinning: inter-institutional arrangements whereby two or more institutions jointly define a study program in terms of credits and content, possibly but not necessarily offering double degree.

Offshore institution: an institution which, in legal terms, belongs to a given country but does not necessarily have a campus in that country and is having a campus in a third country.

Corporate universities: usually large corporations setting up their own higher education institutions without belonging to any national system.

International institutions: institutions that offer "international" qualifications that are not part of any specific educational system.

Virtual universities: institutions offering education across borders mainly or solely on line.

On entering the WTO, China made partial commitments for education services, agreeing to open the service trade to the outside world under certain conditions. According to the Ministry of Education, China has made the following commitments for the education services:

1. No limitations on market access and national treatment in mode of consumption abroad, which means China takes no measures to restrict its citizens from studying or receiving training abroad.

2. Joint schools will be allowed to be established, with foreign majority ownership permitted.

3. Foreign teachers are expected to have the following qualifications: possession of Bachelor's degree or above and an appropriate professional title or certificate, with two years' professional experience.

4. The fees of schools, universities and other institutions offering joint Chinese-foreign programs will be determined by the government.

5. Services of compulsory education and special education (military, police, and political and party school education) are excluded.

6. No commitments for market access and national treatment were made in the mode of cross-border supply.

7. Schools or other educational institutions established independently by foreign institutions will not be permitted (Zhou, 2003).

V.4.5 The Debate on the Impact of WTO/GATS on the Higher Education Service Sector

The GATS agreement on trade in education services remains a topic of ardent political discussion among the signatories of the treaty as well as among various non-governmental organizations and other representatives of the civil society. According to the critics of the agreement, there are several internal mechanisms in the GATS that in fact have negative effects on education. According to them, some aspects of the agreement are not are beneficial from the point of view of education itself and from the point of view of national education goals. The debate has generated a variety of critical opinion papers, replies to the critics by the WTO, and a few empirical studies examining the impact of GATS has published its responses to the claims made by the civil society organizations (EL & PSL 1999; WTO (2000), and Gottlieb & Pearson, 2001).

The WTO argues that GATS is a voluntary agreement because countries can decide which sectors they will agree to be covered. Under GATS rules, countries agree to their own liberalization reforms and phase-in these through the preparation of their own national schedules of commitments and through the 'request-offer' negotiation rounds. But many question whether pressures from neo-liberal international organizations, such as the IMF and World Bank, and the need to negotiate other aspects of trade liberalization have forced developing countries to a liberalization agenda in the area of education that very few education stakeholders in their countries would freely agree to. On this issue, three major areas have been widely debated: 1) the impact of WTO/GATS liberalization on country sovereignty and on the role government plays in regulating and monitoring

education; 2) the effect on domestic higher education institutions and the balance of the economic costs and benefits of trade in higher education services; and 3) the impact of trade on the public/private mix of higher education provision.

The first area of controversy regarding the liberalization of trade in higher education is the potential threat to a country's sovereign right to regulate education, or the alleged transfer of regulatory authority from national governments to an international body such as the WTO. This is central to the anti-GATS critique. Agreements to accept any framework of rules, whether bilateral or multilateral, by definition entail some curtailment of sovereignty, although the decision to enter into such an agreement is itself an exercise of sovereignty. Over 140 governments have chosen through membership of the WTO to participate in a package of multilateral agreements because they recognize the overall net economic and social benefits that accrue from a rules-based trading system (Sauve, 2002).

But the area of education is more sensitive than others to the issue of sovereignty. The reason is that education is a social sector that governments often provide as a basic human right, sometimes as part of their Constitutions. This should put the sector outside the supervision of outside authorities. The WTO recognizes the threat to a country's sovereignty of imposing rules on sectors where government authority is essential. As a result, their Article 1.3 (WTO, 2000) is intended to exclude from the agreement these key government services. This article defines which services are covered by --or exempted from—the WTO/GATS agreements. According to the WTO, the agreement is deemed to apply to all measures affecting services except "those services supplied in the exercise of

governmental authority (WTO/Text, 2000)". GATS supporters maintain that education provided and funded by the government is therefore exempted.

But others express concern that the whole question of the protection of public services is very uncertain and potentially at risk in view of the narrow interpretation sometimes given by WTO decisions on what governmental authority means. The agreement expands on what "in the exercise of governmental authority" means by noting that the service must be provided by the government on a 'non-commercial basis' and 'not in competition' with other service suppliers (Knight, 2002). On this basis, educational services may or may not satisfy the definition, depending on the structure of the education sector. Despite WTO assurances, the impact of WTO/GATS agreements on government sovereignty over education is unresolved and is likely to generate heated controversy in the future, as trade in educational services grows over time. Indeed, the European Union on February 2002 bowed to public pressure and announced that education could not be covered by GATS rules in the current negotiations (AUT/Trade).

The second area of controversy regarding the effects of WTO/GATS on the higher education sector is its potential impact on the domestic education sector. This is of particular concern to local stakeholders in the education sector of developing countries, such as teacher and professor unions. One has to bear in mind that GATS is not a neutral agreement. It aims to promote and enforce the liberalization of trade in services and the intention of GATS is to facilitate and promote ever-greater opportunities for international trade. In this sense, the analysis at the beginning of this chapter on the costs and benefits from trade applies here: trade provides some gains but it also has costs.

Some benefits accrue to consumers who have access to a greater variety of higher education services. For producers, on the other hand, the impact of trade in services is less clear. Public sector institutions may be negatively impacted by the presence of increased competition from abroad. Teacher and professor organization sometimes express ample opposition to increased trade liberalization in education because they see their jobs and/or salaries threatened by trade. Students feel that the WTO/GATS agreements will reduce public spending in education and pave the way for reduced scholarships, leans, etc. According to a study from the National Unions of Students in Europe (European Student Handbook on Transnational Education, 2004), the main concern from students in European countries is the fear that GATS would pave the way for a complete commercialization of higher education by which national governments will lose their power to fund their public education system and jeopardize the basic human right to education (see also Oosterlinck, 2002).

Governments, however, have more varied opinions on the topic. Some countries see the entry of foreign institutions into the domestic higher education market as a threat to their power over the local education sector. Others see it as a means of increasing the supply of higher education services without a need to increase taxes or generate other public sector revenues to support a rapidly-growing population that wishes to enroll in higher education institutions. Some in developing countries, however, criticize this willingness of governments to divest their education responsibilities, based on an economic rationale. According to Ball (1998), government capitulations of its central role in education "symbolize the increasing colonization of education policy by economic policy imperatives (Ball, 1998)."

The private sector in developing countries has generally supported efforts to liberalize trade in higher education services. The main reason is because the private sector sees trade liberalization as being complementary with local liberalization of higher education. In many countries, higher education has been seen by the government as a public good benefiting the whole society, funded by the public sector, and under the strict control and regulation of public authorities. This has excluded any role for non-government suppliers, whether for-profit or not. But many in developing counties view this approach –with its emphasis on al almost exclusive role for the public sector—as obsolete for the higher education sector. They see higher education as primarily a private good benefiting the person acquiring it (i.e. student), who can pay for it on an individual basis (Nokkala, 2002). The emphasis is on allowing market mechanisms to operate in the sector and they see trade agreements as a means of facilitating those mechanisms

As mentioned earlier, WTO member countries have negotiated the extent to which they are willing to make commitments to trade liberalization in the area of higher education. If they are willing to liberalize, they also follow they own national schedules of commitments, in accordance with the four modes of supply: Cross border supply (mode 1), Consumption abroad (mode 2), Commercial presence (mode 3), and Presence of natural persons (mode 4). In general, countries have put more limitations on trade in primary and secondary education than on higher and adult education. WTO member countries have chosen to impose considerably more limitations on trade in educational services in mode 3 and mode 4 (presence of natural person) than in modes 1 and 2. Mode 2 is the most committed mode among all four modes. All countries that have made a commitment in educational services have made commitments in mode 2. Mode 4 is the

most restricted among the four modes. Most of the countries have made no sector-specific commitment in mode 4 but have made some commitments in their horizontal commitments. This means that there are more limitations on market access compared to national treatment (OECD/CERI, 2002).

However, the education sector remains one of the least committed sectors on the GATS. The concerns discussed in this section prevent countries from making any stronger commitments to GATS. To this date only 44 of the 144 WTO members have made commitments to education, and only four (USA, New Zealand, Australia and Japan) of the 21 countries with higher education commitments have submitted a negotiating proposal outlining their interests and issues regarding further liberalization initiatives (UNESCO, 2003).

China's approach to the liberalization of services, as noted earlier, is a mixed one, allowing an opening of such trade, but with a number of restrictions noted above. This shows that, despite the complaints to the fact that the inclusion of higher education into GATS threatens the steering capacity of a national government to exercise a control over education policy making, it is still possible to formulate a trade liberalization policy on higher education without sacrificing the public sector's steering capacity in this area. According to the Education Law of the People's Republic of China (1995), Chapter VII, Article 67:

> "The state encourages foreign exchange and cooperation in education. In conducting foreign exchange and cooperation in education, the principles of independence, equality, mutual benefit and mutual respect shall be adhered to, the laws of the People's Republic of China shall not be violated, and the State sovereignty and security and public interests shall not be harmed."

This article provides a basic guideline for how China's GATS negotiations were negotiated. The Chinese government made concessions that have opened-up the domestic tertiary education market for foreign entry. But such entry has been limited, following the underlying guidelines of the 1995 law just stated.

V.5 Summary and Conclusions

This chapter has presented a review of the academic literature on the forces affecting economic growth and the role of higher education and trade in higher education services on that economic growth. The survey concludes that education in general and higher education in specific are a necessary but not sufficient force in generating prosperity in developing nations. Investments in education have been shown to have large payoffs in terms of economic development, but only when accompanied by increased demand for education (investments in physical capital), and good public sector governance.

The chapter also reviewed the theoretical and empirical literature on how liberalization of international trade in goods and services affects economic growth. The conclusion of this literature is that trade liberalization has both potential costs and benefits, but the benefits can be expected to exceed the costs when trade liberalization is accompanied by investments in education, physical capital and good governance. Combined, all of these will have multiplier effects on economic development, but alone they may fail.

Given the significance of the World Trade Organization (WTO) in bringing about greater trade liberalization in the world economy and the role of the General Agreement on Trade in Services (GATS) in the liberalization of trade in services, including higher education services, the chapter provided a survey of the origins and development of both WTO and GATS. It also described the accession of China to the WTO and the commitments made by China in the area of trade in higher education services. As was discussed, when China became a member of the WTO it made significant commitments to open its higher education sector, including allowing foreign institutions to function in the Chinese domestic higher education market. However, there were a number of restrictions on these commitments.

The chapter concluded with a discussion of the debate on the costs and benefits of international trade liberalization in higher education services. Three areas were identified as being the subject of controversy on this issue: (1) the traditional debate on the costs and benefits of trade liberalization, which for nations importing higher education services includes the benefits to consumers in the form of greater diversity of higher education institutions and lower cost, versus the potentially negative impact of foreign competition on domestic institutions, (2) concerns over the limits of the sovereignty of the public sector over educational institutions, and (3) the debate on whether increased trade liberalization of the sector will lead to a greater role for the private sector in general, thus reducing the responsibilities of the public sector in financing education.

The next chapter provides this dissertation's research on how domestic stakeholders in the higher education sector of China perceive the effects of the increased liberalization of trade in tertiary education of that country.

Table 5.1 GATS Classification System for Education Services

Category of education services	Education activities included in each category	Note
Primary Education	-pre-school and other primary education services -does not cover child-care services	
Secondary Education	-general higher secondary -technical and vocational secondary -also covers technical and vocational services for the disabled	
Higher Education	-post secondary technical and vocational education services -other higher education services leading to university degree or equivalent	-types of education (i.e., business, liberal arts, science) are not specified -assumes that all post secondary training and education programs are covered
Adult Education	-covers education for adults outside the regular education system	-further delineation is needed
Other Education	-covers all other education services not elsewhere classified -excludes education services related to recreation matters	-needs clarification re-coverage and differentiation from other categories -for example-are education and language testing services, student recruitment services, quality assessment covered?

Source: Knight (2002).

Table 5.2 Key Elements and Rules of GATS

GATS Element or Rule	Explanation	Application	Issues
Coverage	All internationally traded services are covered in the 12 different service sectors. (e.g. education, transportation, financial, tourism, health, construction)	Applies to all services-with two exceptions: i)Services provided in the exercise of governmental authority ii) air traffic rights	Major debate on what the term "exercise of governmental authority" means.
Measures	All laws, regulations and practices from national, regional or local government that may affect trade	A generic term that applies to all sectors	
General or Unconditional obligations	Four unconditional obligations exist in GATS: . most favored nation (MFN) . transparency . dispute settlement . monopolies	They apply to all services sectors regardless of whether it is a scheduled commitment or not	Attention needs to be given to "most favored nation"
Most favored nation (MFN) treatment	Requires equal and consistent treatment of all foreign trading partners MFN means treating one's trading partners equally. Under GATS, if a country allows foreign competition in a sector, equal opportunities in that sector should be given to service providers from all WTO members. This also applies to mutual exclusion treatment For instance, if a foreign provider establishes branch campus in Country A, then Country A must permit all WTO members the same opportunity/treatment. Or if Country A chooses to exclude Country B from providing a specific service, then all WTO members are excluded.	May apply even if the country has made no specific commitment to provide foreign access to their markets. Exemptions, for a period of 10 years, are permissible	MFN has implications for those countries who already are engaged in trade in educational services and/or who provide access to foreign education providers MFN is not the same as national treatment

Conditional obligations	There are a number of conditional obligations attached to national schedules: -market access -national treatment	Only applies to commitments listed in national schedules Degree and extent of obligation is determined by country	GATS supporters believe that a country's national educational objectives are protected by these two obligations
National Treatment	Requires equal treatment for foreign and domestic providers Once a foreign supplier has been allowed to supply a service in one's country there should be no discrimination in treatment between the foreign and domestic providers.	Only applies where a country has made a specific commitment. Exemptions are allowed	GATS critics believe that this can put education as a 'public good' at risk.
Market Access	Means the degree to which market access is granted to foreign providers in specified sectors Market access may be subject to one or more of six types of limitations defined by GATS agreement	Each country determines limitations on market access for each committed sector	
Progressive Liberalization	GATS has a built in agenda which means that with each round of negotiations there is further liberalization of trade in service. This means more sectors are covered and more trade limitations are removed.	Applies to all sectors and therefore includes education	
Bottom-up and Top-down approach	Bottom up approach refers to the fact that each country determines the type and extent of its commitments for each sector Top down approach refers to the main rules and obligations as well as the progressive liberalization agenda, there will be increasing pressure to remove trade barriers.		Sceptics maintain that the top down approach will have increasing importance and impact thereby increasing pressure to liberalize

Source: Adapted from Knight (2002).

Figure 3: Country Trade in Services Commitments by Mode

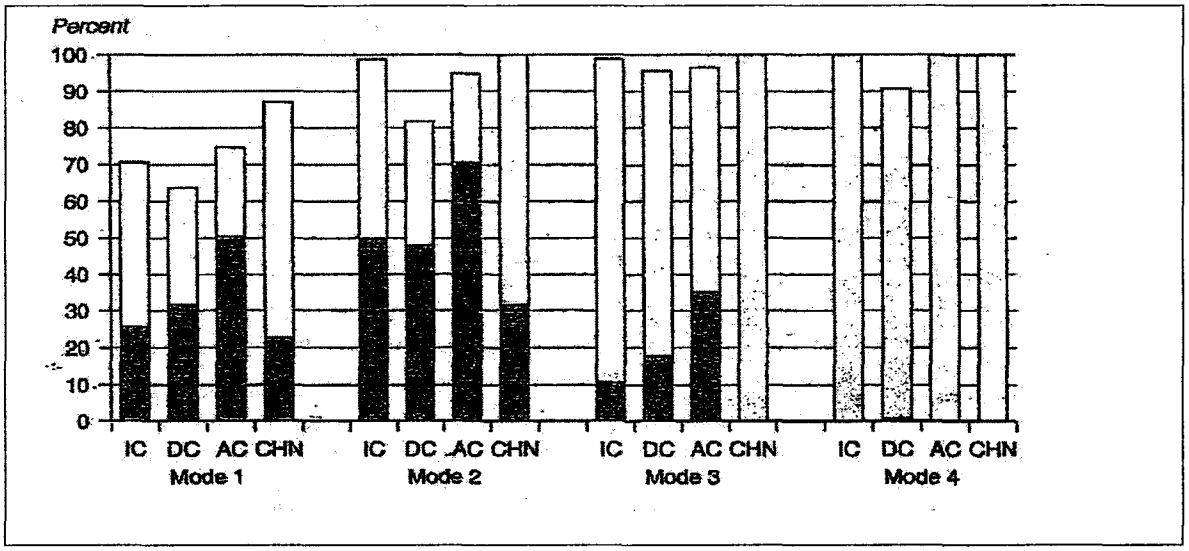


Figure 2 IC= industrial countries, DC = developing countries, AC= acceding countries, CHN = China.
Note: Calculated on the basis of a sample of 37 sectors deemed representative for various service sectors. The upper part of each bar represents partial commitments, the lower part full commitments.
Source: WTO (1999). "Structure of Commitments for Modes 1, 2 and 3." Background Note by the Secretariat, Council for Trade in Services, S/C/W/99. March.

Table 5.3 Types of Cross-Border Education Activities

Type	Main forms	Examples	**Size**
1. People Students/trainees	Student mobility	-Full study abroad for foreign degree or qualification -part of academic partnership for home degree or joint degree -Exchange programs	Probably the largest share of cross-border education
Professors/trainers	Academic/trainer mobility	- For professional development -As part of an academic partnership -Employment in a foreign university -To teach in a branch institution abroad	An old tradition in the education sector, which should grow given the emphasis on mobility of professionals and internationalization of education move generally
2. **Programs**			
Educational programs	Academic partnerships E-learning	-Joint course or programs with a foreign institution -E-learning programs -Selling/franchising a course to a foreign institution	Academic partnerships represent the largest share of these activities E-learning and franchising are small scale but rapidly growing activities
3. Institutions/providers	Foreign campuses Foreign investments	-Opening of a foreign campus -Buying (part of) a foreign educational institution -Creation of an educational provider abroad	A trend increasing very quickly from a modes starting point

Source: OECD, 2004. (Internationalization and Trade in Higher Education: Opportunities and challenges. p20).

CHAPTER VI

INTERNATIONAL TRADE IN HIGHER EDUCATION: PERCEPTIONS FROM CHINESE HIGHER EDUCATION STAKEHOLDERS

This chapter reports the results of qualitative research carried out in this dissertation on the perceptions of Chinese higher education stakeholders about the potential effects of the WTO/GATS-led internationalization of higher education in China. The higher education stakeholders included in the research were educational professionals (professors and administrators) and students selected from a sample of universities in China, and policymakers working at education-related or trade-related government institutions in China. Data were gathered in the period of February through June of 2004 by means of (i) interviews with individuals who are employees of two government policy making institutions and from three public universities; and (ii) background survey questionnaires distributed to university students, faculties and administrators.

Given that cross-border higher education is growing rapidly in China and may bring many challenges to the Chinese education stakeholders, the analysis in this chapter focuses on how Chinese policymakers, students, professors and administrators view the phenomenon of cross-border education in China and whether they have varying

perspectives on it. An effort was also made to identify precisely what are the potential challenges of trade liberalization for China, as determined from the respondents.

VI.1 Research Methodology

In contrast to the quantitative analysis reported earlier in this dissertation (Chapter 3), the research reported in this chapter follows a qualitative approach, with a comparatively small group of individuals in the area of higher education sampled and interviewed to examine in detail their beliefs and perceptions about the liberalization of higher education in China. This is a research topic that has not been explored in the literature. It is an essential one, however, since those directly involved with higher education are the ones being affected by policy changes and therefore remain the most knowledgeable about the actual effects of trade liberalization.

The last chapter showed what the existing literature has determined is the most significant effects of trade liberalization on the higher education sector. But that analysis presented mostly an aggregate or macro level analysis, and it only discussed what would be the potential effects of higher education trade in China. This chapter presents micro-level research on what higher education stakeholders see themselves as the current changes in the tertiary education sector of China and the potential effects of greater trade liberalization in the future.

As will be seen, the opinions and perceptions of those directly involved with higher education in China provide a new and richer diversity of impacts of international

trade in higher education. In fact, their opinions often do not coincide with the expectations obtained from the last chapter. In addition, they identify specific concerns that have not been adequately discussed in the literature.

VI.1.1 Research Questions

From the background analysis on the debate over trade liberalization in higher education services discussed in earlier chapters, one can draw a number of questions addressing the potential impact of WTO/GATS trade in China. The research presented in this chapter is based on an initial set of questions asked of survey participants through interviews and a background questionnaire.

Two sets of issues were explored: (1) how the Chinese education stakeholders view the phenomenon of cross-border education in China, and (2) what are the benefits and costs —from their point of view— as a result of the trade liberalization and what are the main challenges facing the tertiary education sector as a result of the increased liberalization associated with the agreements made by China through the WTO/GATS negotiations.

VI.1.2 The Sample

Three groups were studied: groups A,B and C. Group A was composed of government officials who are currently working in China's government as education

policy-makers or as experts in the area of market liberalization as determined by the WTO/GATS accession.

On entering the WTO, China made a set of partial commitments that would open its service sector to the outside world under certain conditions. The decisions about commitments to trade in higher education under the GATS agreement were based on crucial consultations made between decision-making authorities from China's Ministry of Commerce and the National Center for Education Development Research Center, which is a research branch of China Ministry of Education (NCEDR, 2003). Given the critical role of the Chinese government in formulating trade policy on higher education, expert policymakers were selected first from China's Ministry of Commerce (Department for WTO Affairs) and then from China's National Center for Education Development & Research (NCEDR) for detailed interviews.

In addition to the policymakers in Group A, interviews were conducted in a Group B, consisting of education professionals (e.g. university professors and administrators) and a group C including students in a sample of Chinese universities. The study focused on the faculty, administrators and students in three universities: the Central University of Finance and Economics, the Beijing University of International Trade and Economics and People's University in Beijing. These were chosen from thousands of public universities because of their current involvement in different modes of trade in higher education. Consider, for instance, the case of the Central University of Finance and Economics.

The Central University of Finance and Economics (CUFE) was created in 1949 and is under the direct leadership of the Ministry of Education. It is one of the main

universities to train government fiscal and economic policy officials as well as central bank managers. Nowadays, it is a major multi-disciplinary university, well-recognized in China and abroad in the fields of Economics, Management, Law, Literature and Languages. Most of CUFE graduates find their careers in finance and taxation offices and bureaus of the Chinese government as well as in banking and insurance institutions, private sector enterprises, universities and research institutions.

CUFE has a multi-level academic system consisting of undergraduate, master and doctoral programs. It has five schools and nine departments offering 28 undergraduate programs, 19 master programs, and 9 doctoral programs. Its four major disciplinary concentrations include banking, economics, public finance and accounting. There are 14,000 students currently enrolled with more than 500 teaching staff including 200 professors and associate professors.

The involvements of CUFE in international program are many. Up to 2004, CUFE had established 18 programs with various international partners. Table 6.1 displays the broad scale of CUFE's international education programs.

All the universities examined have significant international programs and that was the main reason for their selection in the sample. Through sets of interviews carried out at these universities, among students, professors and administrators, the opinions of the university stakeholders on the issue of WTO/GATS trade liberalization in higher education were analyzed.

Note that this is a selected sample of people and it does not represent the overall views of the higher education community in China. It reflects, however, the perceptions of those stakeholders who have experience with — and knowledge in handling —

international education programs. The selection of the sample was therefore made on purpose, in order to understand the opinions of those who can provide an informed opinion on the costs and benefits of trade liberalization in higher education. Although including universities without significant international programs in the survey would have made the analysis more representatives, it would also have generated results from persons who have never had experience with international programs. Given their lack of knowledge, including this broader sample could have produced a set of misperceptions about trade liberalization instead of informed opinions on the actual costs, benefits and challenges associated with the liberalization.

VI.1.3 Survey/Interviews

The survey and interview schedule is outlined as an Appendix I, at the end of this chapter. Both the questionnaire and interview instruments were translated into the Chinese language in order to communicate with the respondents and interviewees. The background questionnaires provided to the various groups analyzed in this study are presented as Appendix II to this chapter.

VI.1.4 Field Interviews

In this study, the main data collection method was a set of interviews carried out as field focus groups during which a small group of individuals was asked a series of open-ended questions. In contrast to the categorical answers often obtained from survey-based questionnaires, this methodology allows the researcher to obtain the participants'

specific attitudes and experiences (Berg, 2001). After a brief introduction in which the researcher explained the nature of the study and emphasized the anonymity of the discussion and its use only for research purposes, a permissive environment was set for the discussion, encouraging participants to share their opinions. An initial set of general questions were asked, to generate responses from the participants, but in all cases the participants showed a genuine interest on the subject and responded vigorously to present their experiences. All interactions in the interviews and focus groups were recorded and immediately transcribed after the sessions were finished. A log of the transcriptions and the transcriptions themselves has been organized and are available.

The research carried out for this part of the dissertation is subject to an array of qualifications. Firstly, although it provides richer and more specific and diverse information than what a survey questionnaire can provide, there are relatively few observations (33 students and 52 policymakers, professors and administrators were interviewed). Diverse stakeholders were selected, but there is no way to ensure that the results of the analysis do apply to the overall population in Chinese higher education. A second problem lies in the need for the researcher to avoid imposing his or her own meaning or views during the interviews or in the reporting stage. In this regard, detailed records were made of the interviews and the method of "member checks "(Guba & Lincoln, 1989) was used. This method gets feedback from those being studied, seeking to rule out the possibility of misinterpretation of their meanings and perspectives (Maxwell, 1994). One way through which data collected from the interviews was corroborated was by including a few substantive questions in the background questionnaires that were

administered to participants in the study. Answers to the questionnaire were then compared with those yielded by the interviews, to ensure consistency of the answers.

The matrix in Table 6.1 provides details on the procedures that were carried out in order to (1) prepare for the interviews, and (2) carry out the interviews.

VI.1.5 Data analysis

How do Chinese education stakeholders perceive the on-going proliferation of international trade in higher education services? Do they believe that this trade is positive for China or not? What, in their view, are the problems that challenge the Chinese higher education system the most? This study reports on the results of focus groups and interviews carried out between April and June of 2004 in China. Names have been changed to maintain participant confidentiality.

The field interview responses have been sorted out into two main headings under which most of the responses fell. These two themes follow major themes existing in the literature and discussed in the last chapter. They include:

A. Impacts on public sector governance. What is the impact of higher education trade on Chinese government sovereignty over its own affairs? Does the GATS legal framework in higher education undermine autonomous decision-making by Chinese higher education institutions? Does trade in higher education services reduce public support for education or does it supplement the public sector's efforts in financing tertiary education?

B. The traditional gains and costs of international trade. Do foreign suppliers threaten domestic institutions? Does trade in higher education services – whether Chinese going abroad to study or foreign universities operating in China – provide greater academic diversity possibilities at a lower cost to students in China? What value do the policymakers, students, and university professors/administrators attach to the development of 'jointly-run' programs with other foreign country education institutions? Do foreign degrees —or Chinese-foreign joint— higher education degrees/diplomas bring value added in China's job market?

VI.2 Chinese Stakeholders Speak: Effects of Trade in Higher Education on Government Sovereignty

The Chinese higher education stakeholders sampled in this study had diverse perspectives on the impact of trade on the sovereignty of the government over the higher education sector in China. But these perspectives differ greatly from those noted in the literature, as summarized in the last chapter.

First of all, Chinese higher education stakeholders generally disagreed with the view that increased trade in higher education services has or will have a negative impact on China's public sector sovereignty over the tertiary education sector. The reality appears to be that, despite the strong concerns and opinions historically expressed by many in the international higher education community --including policymakers, academics, and non-governmental organizations-- about the potentially negative effects of international trade and WTO/GATS on the sovereignty of governments in controlling

and managing their own higher education affairs, the Chinese stakeholders –with rare exceptions—do not share these views.

The interview with members of Group C, which includes university students, suggests that they do not believe that the government capacity to control higher education has been compromised by cross-border trade. However, they also indicate that they do not have enough knowledge about the WTO/GATS agreements to provide informed detailed opinions on this issue. It should be emphasized that the term "trade liberalization in higher education," for those interviewees was interpreted into "Kua Gou Gao Jiao," in Chinese language; meaning cross-border higher education. This terminology in the Chinese language contains what constitutes what is the common usage and understanding in the language regarding international trade liberalization.

There were 33 university students interviewed. Twenty-four of the 33 student respondents are undergraduate students in their late teens and early 20s. There are 18 males and 15 females. Among the interviewees, Table 6.3 shows that only 1 of them was fully aware of the WTO/GATS negotiations and its related issues connected to higher education. Female students seem to have a better knowledge of WTO negotiations than male students. On the other hand, Table 6.4 shows that there was no significant difference between graduate and undergraduate students.

In the interviews, the overall opinion of the students was that increased cross-border higher education trade has not affected —and will not affect— the government's sovereignty. They felt that the government has been increasing resources to colleges and universities lately and that, if anything, the increased internationalization may have put pressure on the government to make their universities more competitive. At the same

time, they noted that they did not know much about the details of the WTO/GATS agreement. For instance, Mr. Chen, an undergraduate student from People's University said, "We don't know the term GATS...but of course, we know very well about the situation of cross-border higher education and these programs provide us with the opportunity to study abroad or attend foreign programs in China." Ms. Li, a graduate from the Beijing University of International Trade and Economics pointed out "If you ask about the government capacity to handle the current cross-border trade, we can give you our positive answer. If you mention what is GATS negotiation in education, we can't answer you. Because this is the business of our government and we have no idea about this." Ms. Li's opinion represents the majority of students. They are familiar with the real situation of cross-border education and they feel that the capacity of the Chinese government in regulating it has not been hampered at all, but they are not familiar with the term GATS or the details of the negotiations.

In contrast to the students, most policymakers, professors and university administrators reported that they were well informed about the WTO/GATS agreements relating to higher education. A total of fifty-two policymakers, professors and university administrators were interviewed and background questionnaires were collected from them. Just over half of the respondents are under 40 years old. There are 28 males and 24 females. Eleven are deans or directors. Based on academic titles, 14 are professors, 26 associate professors and 11 lecturers. A total of 29 persons sampled were members of the Communist Party.

One of the questions asked was about whether the WTO/GATS legal framework will undermine the autonomous decision-making by Chinese higher education

institutions. The findings show that a large majority of the respondents believe that WTO-sponsored trade liberalization in higher education in China's market (the GATS legal framework) will in fact strengthen the autonomous decision-making power of the Chinese higher education institutions. As Table 6.5 shows, no participant believed that the international trade liberalization will weaken the government's sovereignty, but 46 out of 42, or 88 percent, felt that the WTO/GATS agreement would actually strengthen the government sovereignty. Only six expressed some reservations about the capacity of the Chinese government in steering the process successfully. Interestingly, all the six are Communist Party members

The strong belief that increased cross-border higher education in China will not undermine the autonomous decision-making sovereignty of Chinese government is surprising, given the popularized, anti-globalization views expressed by many policymakers in other countries on the WTO/GATS agreements. Why they were so positive about trade in higher education?

Firs, the Chinese policymakers and university personnel sampled emphasized their opinion that the WTO/GATS recognized China's existing laws and powers to regulate the industry and could not undermine them. In regard to current Chinese-foreign, jointly-run programs, some of those interviewees pointed out that the "Regulations of the People's Republic of China on Chinese-Foreign Cooperation in Running Schools" (the Regulation) which were released on February 19, 2003 and came into effect on 1st September 2003, clearly define the ground rules for foreign universities wishing to establish joint degree programs with Chinese universities and these cannot be challenged by the WTO/GATS agreements. They emphasized that the Regulations have established

the sovereign authority of the Chinese government in cooperation with foreign education services providers in running schools in China. For instance, core articles in the chapter of General Provision of the Regulation indicate that "Chinese-foreign cooperation in running schools shall abide by the laws of China, implement China's educational policies, comply with Chinese public ethics and shall not jeopardize China's sovereignty, security and public interests (MOE, 2003, Article 5). The firm belief of the education policymakers interviewed was that the WTO/GATS agreements do not and cannot undermine these Regulations.

There were a number of policymakers (all of them members of the Communist Party) who not only supported the Chinese government's approach of allowing only limited trade, but went further to express their support for additional, specific limits on the scale of foreign operations in China's higher education field. They stated that it is very important to limit some specific foreign activities in China. One area noted by several interviewees was not allowing foreign religious organizations, religious institutions, religious colleges and universities or religious workers to engage in higher education activities in China. They suggested that, as policy-makers, they will watch over joint Chinese-foreign schools and programs, making sure they do not offer religious education with foreign partners. One policy-maker, Mr. Yang, who works for the Ministry of Education, commented, "People have to remember that in China, trade in educational services is involved with ideological issues such as the nation's educational sovereignty, its cultural traditions and national languages. Thus compared with most other international trade areas, trade in educational services is more politically sensitive and special, and sometimes must be painted with a 'deeper color of trade protectionism'".

Why do Chinese stakeholders believe that the WTO/GATS agreements will strengthen the government's control over the tertiary education system? The discussions during interviews suggest that there is wide consensus that the entry of foreign institutions will force the government to develop and enforce more strict quality assurance mechanisms. This side-effect of the trade agreements, they feel, will strengthen the government role in monitoring and managing higher education. To the education stakeholders interviewed, it is of particularly significance to urgently establish a systematic mechanism of quality assurance and accreditation in Chinese higher education. Table 6.6 shows that all education professional respondents (policymakers plus professors and administrators) regarded quality assurance as 'very important' or 'important.' As much as 40 percent thought it was "very important" and 60 percent believed it was "important."

In the interviews, the respondents strongly stated that there is a serious concern about the entry of low-quality foreign academic programs into China. They feel that the pressure to ensure that the quality of foreign programs in China is not low will require policymakers to provide a more solid national quality assurance and academic accreditation system. This will benefit the overall tertiary education sector.

They did not think that China would be able to deal with low-quality foreign suppliers on a bilateral basis or through international agreements. Rather, they believed the government would have to establish a sound and effective nation-wide system that would monitor the quality of foreign (joint) and domestic higher education institutions. Table 6.7 shows that as much as 96 percent of all educational professionals believed that there is a need for a national accreditation agency, as opposed to other accreditation

mechanisms. Most of the respondents felt that China does not currently have a systematic, national system of evaluating universities on an institution-wide basis, relying instead on a review regime that operates on an ad-hoc, case-by-case basis.

The lack of transparency of the current regime of quality assurance was another issue mentioned by most of the education professionals interviewed. The interviewees gave a number of examples showing how the lack of transparency and regulation has created problems in cases involving foreign suppliers. They said the foreign investments in Chinese higher education are making necessary an overhaul of the overall regulatory and supervision system. This is because the cooperation with foreign partners in running tertiary education programs in China involves major capital investments on the part of the foreign parties, which raise a substantial volume of revenue for the Chinese-foreign run schools and programs. In the current situation, the Chinese government shows a lack of capacity to monitor the spending of the education fund obtained from these operations. Consequently, corruption in the process of approving foreign applications enables some foreign education service providers without proper qualifications to get permission to run schools or programs in China with their equally unqualified Chinese partners.

Concerning the problem of corruption, interviewees mentioned a case, which may serve as a significant point of reference on this issue. In China's 2004 financial audit, approximately one-tenth of the investigations were related to education. The investigation revealed many serious problems including illegal authorization and illicit acquisition of land for constructing new colleges, or so called "college towns." There are cases of universities or other higher education institutions collecting excessive tuition from

students' parents; and some regions squandering or diverting of educational resources for other purposes.

According to a report published on June 23 by Li Jinhua, China's Auditor-General, the Auditing Administration carried out auditing investigations on university cities in Nanjing, Hangzhou, Zhuhai and Langfang (a suburb of Beijing). More details about the case were also reported by information sources such as Asia Times. The Times reported that the preliminary auditing report shows the investigation looked into 17 provinces (district, cities) and 50 counties' education funds. Investigators discovered that the most prominent problem has been the heavy deficits in provincial and counties' education funds. The problem has grown fairly quickly over the years and has become a great pressure on county governments and schools. The audit discovered that at the end of 2001, education deficits from 50 provinces totaled 2.4 billion Yuan (US$289.8 million). By the end of 2002, it had increased 30 percent to 3.1 billion Yuan (US$374.3 million). Furthermore, in just half a year, by the end of June 2003, this number had increased another 2.7 percent, reaching a total of 3.9 billion Yuan (US$470.9 million) (Asia Times, 2004, July 19).

When asked about the relevance of the cases they had raised in their interviews to cross-border education, several faculty members commented that it is a common knowledge that many foreign-Chinese joint run schools and programs have absorbed unusual amounts of funds. They need land to establish the new campus or to expand the existing school buildings, and "Who can guarantee that there is no corruption in this 'rich business?" was the response.

It was also noted that not all Chinese-foreign education partnerships operate within the letter of the law; that approval is ambiguous and multilevel; and that not all partnerships clarify their legal status publicly. Now, according to the Regulation examined in the last chapter: "The president or the principal administrator of a Chinese-foreign cooperatively-run school shall be a person with the nationality of the People's Republic of China, domicile in the territory of China, love the motherland, possess moral integrity, and have work experience in the field of education and teaching as well as compatible professional expertise (MOE, 2004, Article 25)." But according to study participants, this is a general guideline that is often not practiced.

A particular case was reported in which a foreign university offered an online MBA program in China without a Chinese university partner and with the personal approval of one official who officiated at the program's launch in Beijing in 2002. This Chinese company was not a ministry-approved Chinese company although it was involved in delivery of the education service (The Observatory, 2003). Some participants also noted that there are overseas Chinese individuals or study agencies that play a role in helping Chinese universities and foreign universities to establish cooperation relationships in running degree programs in universities in China. Some of those overseas Chinese study agencies do not meet the required academic qualification but through connections ("Guanxi") are able to help their foreign partners and themselves to get official approval to run education programs and benefited from this act.

In fact, corruption in all of its many forms has become a central issue in higher education. Some observers believe that this is not just a problem in China but in other countries as well. In fact, Yang (2005) points out that an analysis of corruption in China's

higher education demonstrates how the corporate "Western" managerial and market accountability mechanisms are becoming layered on top of more traditional accountability systems in China based on personal relationships in the form of Guanxi. The result has been corruption (Yang, 2005).

An alternative view is that corruption in higher education reflects a general pattern in an economy that is growing very quickly –and thus generating substantial economic profits that many are seeking to share. In countries where the government retains substantial decision-making power, as in China, low-paid government officials have the power to extract rents from the rest of the booming economy. The incentives are too high in this situation, thus giving rise to the growing problem.

Whatever the view one holds of why corruption has emerged as an issue, the fact is that the government is making efforts to adopt a more systematic and institutional approach to combating the problem. The third session of the 10th National People's Congress of P.R. China which was held in March 2005, the CCP announced that the anti-corruption task has transformed from "...combating corruption through political movement and combating corruption by those in power to combating corruption through institutions (People's Daily, 2005, March 16)." It is not clear whether the resources dedicated to fighting corruption have increased, but the efforts to combat corruption have certainly been made more visible to the public by the government, with the goal of deterring illegal activities. According to the newly released report from procurator-general of China's Supreme People's Procuratorate, Mr. Jia Chunwang to the Third Annual Session of the 10th National People's Congress (NPC) in spring 2005, there are 11 government officials at provincial or ministerial level who were investigated and

charged with corruption charges in 2004. In addition, the Chief Justice, confirmed that the court system, in total, penalized 772 corrupt officials and dealt with 24, 184 cases involving government officials' graft, bribe-taking and other corruption activities in 2004 (People's Daily, 2005 March 9).

To summarize: the policymakers and university professionals interviewed by this study believe that trade liberalization will have as a side-effect the need for the government to pay more serious attention to the problems of quality-assurance and accreditation, as well as dedicate more resources to the regulation and supervision of higher education institutions, both foreign (joint) and domestic.

VI.3 Chinese Stakeholders Speak: The Traditional Gains and Costs of International Trade

Proponents of trade in higher education argue that such trade provides greater academic diversity possibilities to students. Critics reply that foreign suppliers will displace domestic institutions of higher education. What opinions do the policymakers, students, and university professors/administrators in China attach to trade in education, whether in the form of Chinese students going to study abroad or the development of 'jointly-run' Chinese-foreign programs located in China?

The sample of students interviewed valued very highly the opportunities that study abroad and foreign programs at home provide them with. They therefore saw trade as a positive force. Table 6.8 shows the distribution of responses as to the question of

who can be expected to obtain better opportunities from transnational trade in higher education. Close to 67 percent of all students thought that students benefited the most, as compared to higher education institutions or the state educational system.

In the interviews, many students mentioned that the most important thing that Chinese students can benefit from in cross-border education is the ability to obtain knowledge that is not available in Chinese institutions of higher education, whether in the form of content or in the form of culture and understanding. Ms. Xia, an undergraduate from the Central University of Finance and Economics said, "We think whether we choose to study abroad or study at China, cross-border education provides us with a great opportunity to understand the outside world, particularly, when we compare this situation with our parents generation." A great consensus is shown among the majority of students who believe that cross-border higher education will bring more positive opportunities to the Chinese students in integrating them into the international higher education field.

In terms of the skills they obtain from foreign degrees abroad or from foreign institutions at home, the students generally viewed these as positive. As Table 6.9 shows, close to 85 percent thought that those degrees would provide significant value added in their job search in China. In focus groups and interviews, however, students qualified these results, observing that they were concerned about the quality of that education. Students interviewed raised serious concerns about the poor quality of some foreign MBA degrees offered in China; the academic credential for foreign teachers, the quality of teaching in Chinese private universities, and even provided some negative experiences they knew about from students studying abroad.

All this reflects the fact that university students, as the main consumers of trade in higher education services, no longer worship foreign or Chinese-foreign joint higher education programs blindly. They show rational thinking and clearly assess in a comparative way the value of foreign or Chinese-foreign degrees in China's job market. They strongly urged the government to establish national mechanisms for assuring that they foreign programs they have access to be of high quality. In fact, responding to the requests of students, the Ministry of Education has a newly established service to help Chinese students to investigate academic qualifications of foreign universities, and will evaluate academic degrees of overseas universities to guide Chinese students to universities that issue officially-recognized academic degrees. The service is only available in its Chinese language websites www.jsj.edu.cn. This service website contains substantial public information in cross-border higher education. For instance, the number one warning note on the website issued in 2005 to Chinese students studying in France indicates that the so called 'university equivalent degrees' from "COMME UN CHINOIS A PAIRS" are not recognized by the Chinese government since the government of France has not granted quality recognition to that school.

Interviews with policymakers and educational professionals also generally provided a positive view of the internationalization of higher education in China. Several individuals emphasized that when universities engage in international cooperation with their foreign partners, one of the important principles is "to make good foreign things serve China," not simply to copy the entire curriculum and content from their foreign partners. One educational professional opened the discussion by making the comment that Chinese universities should bear firmly in mind the lesson "learned from the Soviet

Union" in the early 1950s. He was referring to the fact –noted in the last chapter-- that Chinese universities imitated Soviet Union's higher education management model indiscriminately and suffered greatly from the consequences. Today, even though many Chinese universities have made efforts to eliminate the bureaucratic and centrally-planned influence of the Soviet management model for years, there has been no substantial breakthrough. He stressed that "the Soviet Union attempted to impose on us a higher education system mirroring theirs and by that time, there was no effort to adapt it to the special situation in China." We should not repeat the same mistake, he continued.

Other interviewees commented that existing traditions in Chinese higher education institutions and faculties could make difficult some responses to the powerful wave of internationalization in higher education. One professor stated that Chinese universities and education professionals should be more tolerant and open-minded to meet cultural challenges in the course of internationalization. Another young professor reinforced this view. He commented on the challenges of the internationalization of higher education by emphasizing, "Respect for tradition does not mean the wholesale acceptance of everything past. Traditional culture needs to be renewed constantly. In this 21st century, Chinese people need take a more positive attitude towards the relationship between internationalization and tradition in China's higher education" He ended up his comments by using a Chinese proverb: "One can not give up eating for fear of choking."

Various professors from different universities shared the view that it is necessary to discard some of the old paradigms and only select the good elements from the traditional Chinese culture. One middle aged, male scholar mentioned the example of "the absolute authority of the teachers" in traditional Chinese education culture. He

pointed out that the relationship between teachers and students are equal in modern higher education. This symbolizes the process of changing the traditional culture concept in education.

Most of those interviewed favor the idea that universities should open up more widely to the world in order to integrate Chinese higher education into the international academic environment. It was suggested that Chinese-foreign jointly run programs should pay more attention to curriculum design to add more content with Chinese characteristics. But what emerged from the discussion was a consensus that internationalization in higher education provides university faculties as well as students with the freedom to exchange knowledge and ideas with the outside world. And this constitutes a major gain for China.

But a number of educational professionals also raised concerns about ensuring a minimum quality for the foreign degrees offered to Chinese students. One policymaker, Mr. Zhang, remarked on a set of problems that China is facing in its higher education market. According to Mr. Zhang, these problems include:

> (1) Due to the asymmetric access to information, some Chinese students follow the trend blindly to go abroad to study. Some education institutions from service exporting countries misled Chinese students with a poor quality education that seriously jeopardized the interests of Chinese consumers.
>
> (2) The phenomenon of for-profit schools which use illegal Chinese study- abroad agents, publicizing false advertisements to fool Chinese students into going abroad, giving them low-quality education in return.
>
> (3) The problem of quality of Chinese higher education degrees or diplomas abroad. Some Chinese scholars were accorded unfriendly reception in some host countries because they hold advanced degrees from Chinese universities.
>
> (4) In existing Chinese-foreign jointly run programs and schools there are quality problems, such as numerous overlapping programs providing low-level, low-quality content. There is a problem in not being able to attract top quality educational resources from foreign countries.

Other professional educators and students enhanced Mr. Zhang's remarks. They commented on the poor-quality of some Chinese-foreign joint programs they were aware of. One middle aged male university educator commented, "It should be pointed out that some foreign universities and education institutions take advantage of some Chinese people's mentality of worshiping foreign education and supply poor-quality MBA degrees in China's higher education market." Another one pointed out that China is short of experience in quality recognition of foreign professional qualifications and lacks a systematic mechanism for quality assurance and accreditation in higher education. He stated that some private post secondary institutions are neither accredited nor formally approved by the government but they run degree granting programs with their foreign partners, a fact that not only damages the quality of Chinese higher education but also hurts students confidence and in the long-run will harm the quality of human resources of the country.

One participant observed that the problem is that low-quality Chinese universities seek joint programs with foreign universities to raise their profile. He noted that some Chinese private universities do not have well-trained and responsible faculty or relevant educational facilities such as libraries, computer labs, but those private universities through GuanXi established their MBA programs with foreign partners to grant joint degrees to students. This scholar and others went on, however, to note that this phenomenon is destabilizing China's higher education system and causing confusion for students and their parents who are paying a lot for this type of higher education. In regard to the low academic performance of some foreign universities offering programs in China, one professor stated that it is not always true that "monks from afar chat about

Buddhist scriptures with ease.'' (This is a Chinese proverb, meaning that people from afar seemingly tackle problems more easily than local people).

Despite the potential negative effects of low-quality education among foreign suppliers, some interviewees stressed that domestic universities suffered from the same problems and that what was needed was a strengthening of government monitoring of academic quality of both domestic and Chinese-foreign joint programs.

Another area of concern among education stakeholders was the extent to which there is a bubble in the higher education market, leading to an excessive expansion of the sector. All the stakeholders –students, policymakers and university professors and administrators—were well aware of the rapid expansion of enrollments in the last five years. They were concerned about whether the entry of foreign institutions is as valuable in an environment where there is an over-supply of college graduates. Many felt that the value of a foreign degree in China may be low in today's labor market.

Some students pointed out the value of a foreign degree or diploma really depends on the field of the degree. For instance, foreign degrees in the field of high technology, science or finance will help their holders find job easier than degrees in social and humanitarian fields. As one interviewee suggested, "The reason is simple, since most of Chinese technology firms and companies lag behind industrialized countries in technical innovation and capital; therefore, foreign trained graduates with updated knowledge will find a good job in these fields." They mentioned examples of both successful and unsuccessful job hunting cases of Chinese overseas returnees who hold foreign degrees or diplomas.

Other students thought that the over-supply problem was one that affected graduates of local universities and that foreign degrees or diplomas still add more market value than pure domestic ones in China's job market. One young male faculty from Beijing University of International Trade and Economics questioned whether China's job market needs so many MBA graduates. "MBA stands for master of business administration. Does China have enough business management positions for MBA holders?" This question is representative of the attitudes of most faculties and students toward the issue of study for the purpose of employment.

In addition, some of the policymakers and university administrators addressed the job situation for university graduates, which they thought to be in a very severe state in 2004. Interviewees cited information from a survey conducted by the Ministry of labor, to assess 89 cities' state of employment in 2003. According to the survey, a bigger pool of job seekers, including 670,000 more college graduates than in the year of 2002, helped push up the rate of unemployment. In 2004, there were almost a million university graduates facing the challenge of finding a job. Furthermore, the interviewees mentioned that wages for entry-level college graduates have fallen to an average of US $200 a month, down from US $250 in the year 2002.

There was a consensus that the challenge for university and college graduates in China's job market mainly resulted from the government policy of expansion in higher education, which was introduced in 1999. Following the expansionary public policy, many universities opened branch campuses in the booming southern cities. The private sector established its own schools as well, some of them in the form of Chinese-foreign

joint schools and programs. There was a feeling that increases in the supply of college graduates were exceeding demand.

However, the situation regarding the supply and demand situation for university and college graduates in China's labor market may not be as bleak as some of the participants in the study perceived. Indeed, in 2004 the Ministry of Education studied the issue, examining the labor market for higher education graduates. The study concluded that there is a high demand for persons with more than college degrees and a sustained demand for college graduates. The study calculated how many students were being supplied by China's higher education system relative to the number of students demanded in the labor market. The supply-demand ratio for graduate students was 1:2.5, meaning that the supply failed to meet demand in a substantial way. For undergraduate students, the supply-demand ratio was 1:1.3, showing a minor shortage of supply relative to demand (2004 Green Paper on Education in China).

VI.4 Summary and Conclusions

Higher education stakeholders include public officials involved in higher education policymaking as well as professors, administrators and students in tertiary education institutions in China. This chapter has reported the results of a survey carried out on the opinions of these stakeholders during the period of February through June of 2004. The study carried out interviews with individuals who are employees of two government policy making institutions, and developed focus groups and interviews with

students, professors and administrators from three public universities. A background survey questionnaire was also distributed to university students, faculties and administrators. A total of 52 policymakers, professors and university administrators were sampled and 33 students.

The following general conclusions can be obtained from analysis of the data collected:

1. The finding shows that, in contrast to the negative views expressed by many in the international education community, a large majority of the respondents believe that WTO-sponsored trade liberalization in higher education in China's market (the GATS legal framework) will in fact strengthen the autonomous decision-making power of the Chinese higher education institutions. There is wide consensus that the entry of foreign institutions will force the government to develop and enforce more strict quality assurance mechanisms. This side-effect of the trade agreements, they feel, will strengthen the government role in monitoring and managing higher education. To those education stakeholders interviewed, it is particularly significant to urgently establish a systematic mechanism of quality assurance and accreditation in Chinese higher education. Trade liberalization, they feel, will accelerate this process.

2. Most stakeholders thought that there is a lack of transparency and regulation of the higher education system, which shows in the form of low quality assurance mechanisms. The interviewees gave a number of examples showing how the lack of transparency and regulation has created problems in cases involving foreign suppliers.

They said the foreign investments in Chinese higher education are making necessary an overhaul of the overall regulatory and supervision system. This is because the cooperation with foreign partners in running tertiary education programs in China involves major capital investments on the part of the foreign parties, which raise a substantial volume of revenue and therefore the possibilities for corruption of public officials and the creation of low-quality institutions.

3. Both students and educational professionals valued very highly the opportunities that trade in higher education provides. Students valued the increase variety of experiences that trade offers. University professionals and policymakers thought that China's integration with foreign universities had the potential to modernize the Chinese higher education system.

4. Both students and educational professionals expressed the fear that many existing Chinese-foreign jointly run programs had low-quality problems. They feel there is a problem in not being able to attract top quality educational resources from foreign countries. They also felt that this is a general (domestic and foreign) problem and that a national quality assurance and accrediting system could help in resolving it.

5. Education stakeholders feel there is a bubble in the higher education market in China, causing an excessive expansion of the sector. They are concerned about whether the entry of foreign institutions is as valuable in an environment where there is an over-

supply of college graduates. Many felt that the value of a foreign degree in China may be low in today's labor market.

Table 6.1 Data-Planning Matrix for the case study of WTO/GATS trade liberalization in higher education in China

What do I need to Know?	Why do I need to know this?	What kind of data will answer the questions?	Where can I find the data?	Whom do I contact for access?	Time lines for acquisition
How commitments concerning education under GATS have been made?	To describe the role of governments in policy-making under WTO/GATS	WTO/GATS legal documents, background note by the Secretariat **Appendix I**	Library; Internet, documents, archives	Mr. X. D. Hong, Deputy Director, Division of Trade in Services, Ministry of Commerce, PRC.	Mar/03-Feb/04
Why should the Chinese Government put forth education liberalization policy at this stage?	To examine what factors lead the Chinese government to make national policy in higher education Look into Chinese government responses to WTO/GATS in higher education services	Review Chinese legal documents in higher education (1949-2000) centering on post-Mao time Tsang (2000) conflict theory Data of national economic growth and university enrollment (1997-2002) Communication from China to WTO **Appendix II**	China National Center for Education Development & Research (NCEDR) Archival records Department for WTO Affairs, Ministry of Commerce, PRC.	Mr. M. Zhou, Deputy Director-General, Ministry of Education of PRC. Mr. X. D. Hong, Deputy Director, Division of Trade in Services, Ministry of Commerce, PRC.	Apri/04-May/04 Initial questionnaire distributing Interview with trade/education policy-makers, first week in March.

How do the Chinese stakeholders perceive the WTO/GATS trade liberalization in higher education?	To interpret the Chinese people's responses to the issue of trade liberalization in higher education and to discover the size of higher education market	Field interview, higher education policy-makers, education professionals, students and parents together with students' family visits Review local media information to compare with government official documents **Appendix II**	The Central University of Finance & Economics; Beijing University of Int'L Trade & Economics; People's University of PRC. Chinese local news papers and other information sources	Mr. D. Yuan, Vice President, The Central University of Finance & Economics; Mr. G. Lin, Vice President, Beijing University of Int'l Trade & Economics; Ms. C. Li, Professor, People's University	Apr/04-May/June Process questionnaire returns Analyze and interpret results Prepare finding report Stakeholders' survey, second week in Feb. Field interview, first week in Apr. Follow-up survey, interview, in Apr. 2004.

Source: Adapted from LeCompte and Preissie, 1993 (J. Maxwell,1996, pg.82-83).

Table 6.2 International Programs in Central University of Finance and Economics (CUFE)

Country	Cooperating Institution	Cooperating Contents
UK	British Actuarial Association Zurich Banking Service Group	Graduate program in Insurance Actuary
Holland	Tilburg University	Teaching cooperation
France	The Third Montpellier University	Chinese training program
USA	Stevens Institute of Technology	Teaching cooperation
	Austin Peay University	Staff and Students exchange and research cooperation
Australia	Victoria University of Technology	Joint Program for Training Undergraduate in International Trade/Risk Management
	Deakin University	Cooperative Training Program and research cooperation
	New South Wales University languages School	English teachers training and IELTS training program
	AMP Insurance Group	Scholarship foundation for Academic and Teaching Excellence
Russia	All-Russia Distance Institute of Finance and Economics	Scientific and Teaching Support cooperation
Ukraine	KYIV National Economic University	Research Cooperation
Japan	Asahi Rthur Andersen & Co.	Training of refreshers in accounting
	Takachilo University	Research cooperation in Economics
	Kyoei University	Staff, student and information exchange
	Osaka University of Commerce	Research cooperation and student exchange
South Korea	Central University	Student and information exchange
	Yongin University	Student exchange

Source: Central University of Finance and Economics, Beijing China 2004.

Table 6.3 Responses of Students to "Are You Aware of the Present WTO/GATS Discussion Concerning Higher Education?"

Sorted by Gender

		Fully aware	Partly aware	Not aware	Total
Gender	Male	1	4	13	18
	Female	0	10	4	14
Total		1	14	17	32

Source: Tabulation of Higher Education and GATS Questionnaire.

Table 6.4 Responses of Students to "Are You Aware of the Present WTO/GATS Discussion Concerning Higher Education?"

Sorted by Student Type

Student Type	Fully aware	Partly aware	Not aware	Total
Under-graduate	1	10	12	23
Graduate	0	4	5	9
Total	1	14	17	32

Source: Tabulation of Higher Education and GATS Questionnaire.

Table 6.5 Opinions of Policymakers and University Educators on "What is the Impact of WTO/GATS on Autonomy of Chinese Decision-Making?"

Impact on autonomous decision-making power	Number	Percentage
Weaken	0	0
Strengthen	46	88
Depends	6	12
Total	52	100

Source: Tabulation of Higher Education and GATS Questionnaire.

Table 6.6 Responses of Professional Educators on "What is the Importance of Academic Quality Assurance of Trans-National Higher Education in China?"

Importance of quality assurance	Number	Percentage
Very important	21	40
Important	31	60
Not important	0	0
No opinion	0	0
Total	52	100

Source: Tabulation of Higher Education and GATS Questionnaire.

Table 6.7 On the Issue of Quality Assurance of Transnational Higher Education in China, there is need for:

Measures to be taken for quality assurance	Number	Percentage
National academic accreditation system	50	96
Bilateral	1	2
International	1	2
Not necessary	0	0
Total	52	100

Source: Tabulation of Higher Education and GATS Questionnaire.

Table 6.8 Better opportunities for whom?

Trade benefits most:	Number	Percentage
Students	22	66.7
Higher education system	7	21.2
Higher education institutions	4	12.1
Total	33	100.0

Source: Tabulation of Higher Education and GATS Questionnaire.

Table 6.9 Does a Foreign Degree Provide Significant Value Added in the Job Market?

	Number	Percentage
Definitely yes	2	6.1
Probably yes	26	78.8
Difficult to say	5	15.2
Total	33	100.0

Source: Tabulation of Higher Education and GATS Questionnaire.

CHAPTER VII

SUMMARY AND CONCLUSIONS

International trade in higher education services can be catalogued into four modes:

Mode 1-Cross-border supply focuses on the service crossing the border, but does not require the consumer to move physically. Examples in higher education include distance education and e-learning.

Mode 2-Consumption abroad refers to the consumer moving to the country of the supplier, which in education means students pursuing all or part of their education in another country, as it has been documented above.

Mode 3-Commercial presence involves a service provider establishing a commercial facility in another country to provide a service. Examples in higher education include branch campuses, such as the Cornell School of Medicine in Qatar, or franchising arrangements.

Mode 4-Presence of natural persons, means persons traveling to another country on a temporary basis to provide a service, which in education would include professors as well

as researchers. Many U.S. universities, for example, have exchange arrangements with foreign universities that allow American professors to teach abroad.

VII.1 U.S.-China Trade in Higher Education Services

As shown in this dissertation, most of the international trade of China in higher education services is in what has been catalogued as mode 2 trade: the purchase of higher education services by Chinese students studying abroad. The expansion of this trade began in 1978, under the leadership of Deng Xiaoping, when China allowed the enrollment abroad of students from Mainland China to grow. Since then, the number of international students from Mainland China has risen to 168,702 in 2002. The United States is the largest recipient country of students from Mainland China, with 63,211 students (or 37.5 per cent of the total), followed by Japan with 41,180 students, the United Kingdom (18,122), Australia, Germany, France and Malaysia. The number of Chinese students abroad expands significantly when one includes students originating in the Hong Kong autonomous region and students from Taiwan, China.

In addition to Chinese students abroad, China's higher education trade has increased through the increased enrollment of foreign students in China. In 2003-2004, China hosted 77,715 students from 175 countries. The number of American students in China has been rising rapidly, from 782 students in 1991-1992, to 2,278 in 1998-1999 and 3,911 in 2001-2002. Chinese authorities have made a priority to increase the exports

of higher education services, encouraging tertiary sector institutions to attract foreign students to China.

Other types of higher education trade in China –in modes 1,3 and 4—have proliferated in the last few years. Foreign offshore education in China is growing rapidly. In 2003, there were 712 jointly run educational institutions in China. Jointly-run education institutions encompass activities ranging from co-developed new institutions, to foreign degrees franchised to an existing Chinese university, and programs offering non-degree certificates (Garrett, 2004). The variety of foreign operations in China was documented in chapter 2 through a set of case studies and examples.

VII.2 Impacts of Higher Education Trade on the United States

Mainland China is the second largest importer of higher education services from the United States, following India. In 2003, China imported $1.3 billion worth of higher education services from the United States and exported $0.2 billion, so that the U.S. had a trade balance surplus of $1.1 billion with Mainland China

American exports of higher education services to China have had a substantially positive impact in the U.S. economy. There are direct and indirect effects. The direct effects relate to the impact of export sales on the output and employment of domestic industries The indirect effects indicate that, as those industries expand, so do the subsidiary industries that support them. There is therefore a multiplier effect of exports. In the case of higher education, as colleges and universities grow and their employment

rises, the additional workers will spend their income and sustain a myriad of other sectors of the economy. A rough estimate of the impact of higher education trade on the U.S. economy suggests GNP in the U.S. increased by close to $10 billion as a result of the growth of higher education exports between 1998 and 2004. In terms of employment, this economic growth would have generated over 100,000 jobs over the last five years, with 10,000 jobs accounted for by exports of higher education services to Mainland China alone.

One significant difference between most trade in goods and services and trade in higher education services is that the latter generally involves human beings in a very direct way. For instance, the service imports of higher education services by Mainland China from the U.S. are mainly in the form of Chinese students enrolled in American universities. Because human beings are involved, higher education trade can have effects that are not traditionally considered in the trade literature. One such effect is the impact that the Chinese students may have if they stay in the U.S. once they complete their studies. At that time, the students pass from being treated as U.S exports of goods and services to U.S. residents who are part of the American economy and labor market.

Although estimates are that the fraction of Chinese students in the U.S. returning home has increased in recent years, it is still a fact that the majority of Chinese students stay in the United States after they finish their studies. Statistical analysis carried out in this dissertation using data from the 2000 U.S. census of Population shows that these students have a very high socioeconomic status in the United States. This is partly related to their high levels of schooling, but it is also a result of their high motivation and drive. Regression analysis of wages among the Asian population in the United States indicates

that the Chinese student stayers tend to have higher wages, even after controlling for their high levels of schooling. One suspects, therefore, that when Chinese students decide to stay in the United States and apply their high-level skills and their strong motivation and drive within the American economy, there is an indirect, positive impact that has not been considered in the previous literature.

VII.3 China's Higher Education System: Some Background

In 2003-2004, China had approximately 17 million students enrolled in institutions of higher education, the highest number of students enrolled in tertiary education in the world. But despite its huge enrollment, data presented in this dissertation indicate that, in relative terms, the Chinese tertiary education sector has been severely under-grown when compared to other countries at similar levels of income per-capita. China has a tertiary gross enrollment ratio of about 13 percent, which is substantially below the average for low middle-income countries in general, which had a 21 percent enrollment rate in 2002-2003.

The relatively low tertiary education enrollment rates present in China in recent years are the legacy of the Cultural Revolution and the history of struggles between radical and moderate factions within the Chinese Communist Party in the period from 1949 to 1976. Initially, in the period of 1949 to 1957, China adopted a Soviet model of educational development, consolidating universities into a centrally-planned system with a comprehensive ideo-political curriculum under strong, centralized direction. Then, in

the late 1950s and especially during the Cultural Revolution period (1966 to 1976), anti-intellectualism, a focus on practical (vocational) education, and an emphasis on education for the masses (at a basic level) led to the literal disappearance of tertiary education. Only after the death of Mao Zedong in 1976, and with the predominance of the economic and education reform policies of Deng Xiaoping did higher education gain more prominence.

VII.4 The Great Leap Forward in Higher Education

Higher education has been receiving increased resources in China. But as this dissertation has shown, the rise of government spending on tertiary education has been mainly the result of the rapid economic growth in China, and the associated rising government revenues. As a fraction of GDP, government spending on tertiary education in China has lied below comparable levels in other countries.

To compensate for this shortfall, the government has encouraged private spending on education. Tertiary private sector spending –in terms of private universities, but mostly in the form of tuition and fees charged by public universities—has helped raise total spending on higher education. There has also been a sharp move by the government since 1998 to provide greater public resources for higher education, making it a centerpiece of China's current development drive.

As a result of these major policy initiatives, China has been making a great leap forward in higher education over the last few years. This has resulted in sharply-rising enrollment rates as well as rising ratios of government spending relative to GDP. Given

the deteriorated state of higher education in China at the end of the Mao Zedong era, the recovery of the sector has been remarkable.

The heavy investments of China on its tertiary sector in recent years are likely to pay off in terms of accelerated growth. The review of the existing theoretical and empirical literature on the effects of education –and higher education—on economic growth in this dissertation indicates that education is a necessary, although not sufficient, force in generating prosperity in developing nations. Investments in education have been shown to have large payoffs in terms of economic development, but only when accompanied by increased demand for education (investments in physical capital), and good public sector governance.

VII.5 Impacts of Trade in Higher Education Services on China

One of the strategies adopted by the Chinese government to strengthen its tertiary education sector has been to encourage trade in the sector. Ideologically, this fits well with the country's trade-oriented development strategy. The accession of China to the WTO in 2002 gave an opportunity for policy initiatives to open-up the higher education sector to trade.

The World Trade Organization (WTO) has been essential in bringing about greater trade liberalization in the world economy. The General Agreement on Trade in Services (GATS), which forms part of the WTO agenda, has been leading the process of liberalization of trade in services, including higher education services. The dissertation

provided a survey of the origins and development of both WTO and GATS. It also described the accession of China to the WTO and the commitments made by China in the area of trade in higher education services. As was discussed, when China became a member of the WTO it made significant commitments to opening its higher education sector, including allowing foreign institutions to function in the Chinese domestic higher education market. However, there were a number of restrictions on these commitments.

The dissertation provided a detailed review of the theoretical and empirical literature on how liberalization of international trade in goods and services affects economic growth. The conclusion of this literature is that trade liberalization has both potential costs and benefits, but the benefits can be expected to exceed the costs when trade liberalization is accompanied by investments in education, physical capital and good governance. Combined, all of these will have multiplier effects on economic development, but alone they may fail.

The review of the debate on the costs and benefits of international trade liberalization in higher education services led to the identification of three areas as being the subject of controversy on this issue: (1) the traditional debate on the costs and benefits of trade liberalization, which for nations importing higher education services includes the benefits to consumers in the form of greater diversity of higher education institutions and lower cost, versus the potentially negative impact of foreign competition on domestic institutions, (2) concerns over the limits of the sovereignty of the public sector over educational institutions, and (3) the debate on whether increased trade liberalization of the sector will lead to a greater role for the private sector in general, thus reducing the responsibilities of the public sector in financing education.

VII.6 How Higher Education Stakeholders in China View Trade Liberalization

Higher education stakeholders include public officials involved in higher education policymaking as well as professors, administrators and students in tertiary education institutions in China. The dissertation presented qualitative research on how domestic stakeholders in the higher education sector of China perceive the effects of the increased liberalization of trade in tertiary education of that country. More specifically, the results of a survey carried out on the opinions of these stakeholders during the period of February through June of 2004 were examined in detail. The study carried out interviews with individuals who are employees of two government policy making institutions, and developed focus groups and interviews with students, professors and administrators from three public universities. A background survey questionnaire was also distributed to university students, faculties and administrators. A total of 52 policymakers, professors and university administrators were sampled and 33 students.

Both students and educational professionals interviewed valued very highly the opportunities that trade in higher education provides. Students valued the increase variety of experiences that trade offers. University professionals and policymakers thought that China's integration with foreign universities had the potential to modernize the Chinese higher education system.

Furthermore, in contrast to the negative views expressed by many in the international education community, a large majority of the respondents in the study

believe that WTO-sponsored trade liberalization in higher education in China's market (the GATS legal framework) will in fact strengthen the autonomous decision-making power of the Chinese higher education institutions. There is wide consensus that the entry of foreign institutions will force the government to develop and enforce more strict quality assurance mechanisms. This side-effect of the trade agreements, they feel, will strengthen the government role in monitoring and managing higher education. To those education stakeholders interviewed, it is particularly significant to urgently establish a systematic mechanism of quality assurance and accreditation in Chinese higher education. Trade liberalization, they feel, will accelerate this process.

Art the same time, education stakeholders feel there is a bubble in the higher education market in China, causing an excessive expansion of the sector. They are concerned about whether the entry of foreign institutions is as valuable in an environment where there is an over-supply of college graduates. Many felt that the value of a foreign degree in China may be low in today's labor market.

Both students and educational professionals expressed the fear that many existing Chinese-foreign jointly run programs had low-quality problems. They feel there is a problem in not being able to attract top quality educational resources from foreign countries. They also felt that this is a general (domestic and foreign) problem and that a national quality assurance and accrediting system could help in resolving it.

Most stakeholders also thought that there is a lack of transparency and regulation of the higher education system, which shows in the form of low quality assurance mechanisms. The interviewees gave a number of examples showing how the lack of transparency and regulation has created problems in cases involving foreign suppliers.

They said the foreign investments in Chinese higher education are making necessary an overhaul of the overall regulatory and supervision system. This is because the cooperation with foreign partners in running tertiary education programs in China involves major capital investments on the part of the foreign parties, which raise a substantial volume of revenue and therefore the possibilities for corruption of public officials and the creation of low-quality institutions.

The reform of China's accreditation and supervisory system for tertiary sector institutions appears to be the major area that almost everyone interviewed agreed is essential to sustain a high-quality domestic and international supply of higher education services in China. The pressure to prevent low-quality foreign institutions from operating in the country, many stakeholders felt, is likely to be a good consequence of trade liberalization.

There are various ways to go in such a reform. The United States, for example, has a voluntary accreditation regime which has emerged from America's tradition of decentralization, federalism and autonomy in higher education, particularly with respect to the private sector. The U.S. has therefore non-governmental tertiary sector accreditation institutions, although states also have some regulatory and supervision roles.

Reluctance to give away autonomy, at the national level, is also behind the absence of international or even regional organizations of accreditation in higher education (Bergan 2002). Even in Europe, where a strong movement of economic integration has prevailed, recent discussions to develop an EU-wide organization to regulate and accredit institutions has failed. The so-called Bologna process is based on a

declaration signed in Bologna in 1999 by the Ministers of Education of 29 European countries to develop a European higher education zone. But this process has stagnated (Rauhvargers 2002). Globally, only a few trans-national accreditation organizations have emerged, basically in the area of professional certification, such as in the engineering field (ABET) and management (EQUIS).

Given the unlikely development of international quality-assurance mechanisms, China will require a revamping of its national systems. The research presented in this dissertation suggests that this will be a major step in ensuring that increased trade in higher education services does result in positive gains for the country.

APPENDIX

APPENDIX I:

WOKING SCHEDULE FOR THE DATA COLLECTION

Date/Time	Meeting Location	Title of the Interviewee	Topic of discussion
4/12 (Mon) 9:30am-2pm	Central University of Finance and Economics	Mr. Yuan Dong Vice president of the Central University of Finance and Economics Ms. Cai Caishi Director, International Cooperation Division Assistant professor, CUFEI	1. Brief presentation on the case study 2. Discuss the data collection process with reference with the school's experiences from past similar projects 3. Feedbacks on quantitative & qualitative protocols 4. Class room observation
4/13(Tues) 2:30pm-5:pm	Beijing University of International Trade and Economics	Mr. Lin Guijun Vice Dean, School of International Economics and Management Mr. Zhao Zhongxue Director, Graduate Program of International Finance and Economics	1. Pilot-testing on research protocols 2. Discuss the data collection process with the school's experiences from past similar projects 3. Contact case-study interviewees from different departments
4/14 (Wed) 10:30am-12:00am 1:30am-3:30pm	Ministry of Commerce	Ms. Chai Xiaolin Division Director, Department of International Trade & Economic Affairs Department Reference Library	Introduction of WTO/GATS regulations and China's position in trade negotiation Documents Review

4/15 (Thur) 9:30am-12:00am 2:00pm-5:30pm	Ministry of Commerce	Mr. Hong Xiaodong Deputy Director, Department for WTO Affairs Department Reference Library	WTO/GATS negotiation and China's stand Documents Review
4/19 (Mon) 4:00pm-6:30pm	Central University of Finance and Economics	Office of international cooperation Faculty members	Perception on China-foreign joint program 1. Ask perceptions of WTO/GATS trade in education in China 2. The role of the government in higher education policy-making.
4/20 (Tues) 11:00am-1:00pm	Central University of Finance and Economics	Ms. Qi, Lan Director, Professor MBA program	1. Interview 2. Discussion the interview with students
4/21 (Wed) 11:00am-1:00pm working lunch 1:30pm-2:30pm	National Center for Education Development Research (NCEDR) MOE	Mr. Zhou M. S. Deputy Director-General, Professor	1. Interview 2. Acquiring contact addresses & TEL numbers for some policy-makers in the mentioned three universities
4/22 (Thur) 1:00pm-3:30pm	National Center for Education Development Research (NCEDR) MOE	Mr. Zhang L. Director, Department of Higher Education Policy Research	1. Interview

4/26 (Mon) 10:00am- 12:00am 2:00pm- 4:00pm	Central University of Finance and Economics	Mr. Zhang L Q Deputy Dean & Professor School of Finance Head of program officers (2) Faculty members (2)	1. Interview 2. Interview with program officers and faculty members
4/27 (Tues) 9:30am- 12:00am 2:00pm- 5:30pm	Ministry of Commerce	Mr. Hong Xiaodong Deputy Director, Department for WTO Affairs Department Reference Library	WTO/GATS negotiation and China's stand Documents Review
4/28 (Wed) 3:00pm- 5:00pm	Beijing University of International Trade & Economics	Vice Dean, School of International Economics and Management Mr. Zhao Zhongxue Director, Graduate Program of International Finance and Economics	1. Interview 2. Distribute questionnaire 2. Acquiring contact information for students interview
4/29 (Thur) 11:00am- 12:3-am working lunch 1:00pm- 2:00pm 3:00pm- 5:00pm	People's University	Mr. Zhang, Z.X. Director, Professor School of Finance Advisor on International Affairs Program in Economic & Financial Policy Management Faculty members Students	1. Interview 2. Interview with faculty members 3. Interview with students 4. Distribute questionnaire for the second time.
4/30 (Fri) 2:30pm- 5:00pm 6:30- 8:30pm	People's University	Ms. Wang X. Professor, Deputy Director of the Office for International Studies Faculty members Students	1. Interview 2. Interview with faculty members 3. Interview with students
5/1-5/10	Labor Day long weekend in China	Contact to the Advisor in New York	1. Review documents 2. Sort out interview data 3. documents review at local library
5/10 (Mon) 11:00am- 12:30am	Central University of Finance and	Mr. Zhang TG. Vice President, Professor	1. Interview 2. Interview with

working lunch 1:30pm-4:00pm	Economics	Program officers Faculty members	head of program officers
5/11 (Tues) 2:00am-4:00am 5:00am-7:00am	Beijing University of International Trade & Economics	Program officers Faculty members Students	1. Interview with program officers 2. Interview with students
5/12 (Wed) 2:00am-5:00am	People's University	Mr. Wang P Officer in-charge Office of International Cooperation Faculty members Students	1. Interview 2. Interview with faculty members 3. Interview with students
5/13 (Thur) 2:30pm-4:30pm	Beijing University of International Trade & Economics	Mr. Lin. Guijun Vice Dean, School of International Economics and Management Program officers Students	1. Interview 2. Interview with program officers and faculty members
5/14 (Fri) 2:30pm-6:00pm	Beijing University of International Trade & Economics	Mr. Zhao Zhongxue Director, Graduate Program of International Finance and Economics Students	1. Interview and helped to distribute questionnaires 2. Interview with students
5/17 (Mon) 9:00am-11:00am 4:00pm-6:00pm	People's University	Mr. Zhang Z X Director, Professor School of Finance Advisor on International Affairs Program in Economic and Financial Policy Management Students	1. Interview and helped to distribute questionnaires 2. Reciprocal lunch and informal discussion the issue of the future trade in higher education in China. 3. Interview with students
5/18 (Tues) 11:00am-1:00pm 2:00pm-4:00pm	People's University	Ms. Wang P. Officer in-charge Office of International Cooperation Faculty members students	1. Interview and helped to distribute questionnaires 2. Interview with faculty members 3. Interview with

			students
5/19 (Wed) 3:00am- 6:00am	Beijing University of International Trade & Economics	Mr. Liu Guijun Vice Dean, School of International Economics and Management Mr. Zhao Zhongxue Director, Graduate Program of International Finance & Economics Students	1. Interview with students 2.Dinner and a informal meeting with faculty members and program officers
5/20 (Thur) 9:00am- 11:am	People's University	Ms. Wang P. Officer in-charge Office of International Cooperation	1. Distributing questionnaires 2. Collecting responses
5/21 (Fri) 3 :00pm- 5 :00pm	Central University of Finance & Economics	Mr. Yuan Dong Vice president of Central University of Finance & Economics Ms. Cai Caishi Director, International Cooperation Division	1. Distributing questionnaires 2. Collecting responses
5/24 (Mon) 3 :00pm- 5 :00pm	Beijing University of International Trade & Economics	Mr. Zhao Zhongxue Director, Graduate Program of International Finance and Economics	1. Distributing questionnaires 2. Collecting responses
5/25 (Tues 2 :00pm- 3 :00pm	National Center for Education Development Research (NCEDR)	An officer from the Department of International cooperation	1. Ask opinions for the possibility to distribute questionnaires

APPENDIX II

INTERVIEW PROTOCOL

INTORDUCTION TO THE INTERVIEW

The General Agreement on Trade in Services (GATS), which came into force in 1996, is the first legal trade agreement which focuses exclusively on trade in services, and higher education is one of the services included. The WTO is in charge of GATS, and through this agreement WTO member countries allow market access and remove restrictions in the path of trade in services. China, as a new member of the WTO, made partial commitments to liberalize its trade in education services, including trade in higher education.

The purpose of this study is to focus on the current situation of trade in higher education in China, aiming to gain an improved understanding of the Chinese education stakeholders' perceptions of the potential benefits and costs of WTO/GATS trade liberalization in higher education in China.

It is anticipated that the findings of this study will be used to inform those involved in higher education policy-making and educational stakeholders at national level, as well as those interested in providing education services in international markets.

Your cooperation is strictly voluntary and anonymous. Your name will not be attached to any opinions or responses may not leave any particular questions unanswered or may choose not to complete the questionnaire.

Your participation is very valuable and will contribute greatly to this study.

General Information:

a) Name of Interviewee:
b) Position/Responsibilities/Job title:
c) University/Organization represented:
d) Date and place of interview:

Interview outline

Please answer the following questions from your personal perspective. Please begin your responses to questions with a direct answer, and then continue with any further comments that you may wish to make.

Interview Questions (Outline for interviewer):

1. Are you familiar with the issue of WTO/GATS trade in higher education?
2. In your opinion, what are the advantages or disadvantages of WTO/GATS trade liberalization in China's higher education market?
3. What information regarding imported and exported transnational education is available in your organization/university/institution?
4. What is your main concern on the issue of WTO/GATS trade in China's higher education? Possible alternatives to be introduced, in case there is no response:
   (a) The role of the government in higher education policy-making
   (b) The change in nature of public higher education
   (c) The positive impact on China's higher education system
   (d) The negative impact on China's higher education system
5. In general, do you personally support or resist the idea of GATS trade in higher education and why?
6. In general, do you think that the Chinese people will benefit from WTO/GATS trade in China's higher education market?
7. In your opinion, what types of transnational education does China need the most? Why? Possible alternatives to be introduced if no discussion.

(a)	Franchised education (institutions &/or programs)	□
(b)	Virtual universities (on-line learning)	□
(c)	Conventional Distance learning	□
(d)	Branch Campus operations	□
(e)	International Corporate education/training	□
(f)	Dual degree awards	□
(g)	Others (please specify)	□

8. In China, is the current legal regulation/control of imported transnational higher education effective? Please give details.
9. Indicate which of the following areas you believe will be affected by cross-border trade? How do you characterize the impact of imported transnational higher education?

		Positive	Negative	Uncertain
(a)	Education standards	□	□	□
(b)	Student choice	□	□	□
(c)	Traditional university education	□	□	□
(d)	Consumer protection	□	□	□
(e)	Domestic cultural autonomy	□	□	□
(f)	Other (please specify)			□

10. Which do you think should have responsibility for the quality assurance and accreditation of transnational education? Please consider or more of the following boxes and briefly explain your reasoning:

(a) The national authorities of the importing country? □
(b) The importing/receiving institution? □
(c) International accreditation agencies? □
(d) All of the above □
(e) Other (please specify) □

11. What do you think are the main factors responsible for the Chinese government's commitment to WTO/GATS to open trade in higher education in China?

12. What do you think are the main impacts of WTO/GATS trade in higher education on China's education system?

Please note that all responses are treated in the strictest confidence and no information provided on an individual basis will be attributed.

Thank you for your time and contribution to this work.

WTO/GATS TRADE IMPACTS ON CHINA'S HIGHER EDUCATION

BACKGROUND QUESTIONNAIRE

The main purpose of this study is to explore the potential benefits and costs of WTO/GATS trade in higher education in China's market in terms of higher education policy-making, academic activities as well as the quality of learning. **We would therefore be most grateful if all participants respond to this questionnaire.** The format of the questionnaire should facilitate rapid completion.

Thank you in advance for your time and contribution to this work.

Group A:Policy-Makers and University Administrators

Part I. General Information of Respondents to the Survey

1. Name _____ Sex _____ Age _____

2. Full name of your organization (university, other higher education institution)

_____

3. Address of your organization(s)

_____

Phone:_____ Fax_____ E-Mail_____

4. Type of Organization

a. State university □
b. Policy-making institution □
c. University of Applied Science □
d. Other (please specify) □

5. Function of person completing this form (multiple answers possible)

a.	President of University	□
b.	Vice-President of University	□
c.	Dean	□
d.	Dean of Studies	□
e.	Head of Studies	□
f.	International Relations Officer	□
g.	Professor	□
h.	Lecture	□
i.	President of Student Organization	□
j.	Member of Student Organization	□
k.	Student: Level and field of study	□
l.	Government Official	□
m.	Head of Policy-Making Institution	□
n.	Staff of Policy-Making Institution	□
o.	Gross annual income (for students please indicate family income)	□
p.	Number of children (for education academics and government officials only)	□

Part II: Involvement in Trade in Higher Education Services

1. How is your university/organization/institution involved in trade in higher education services?

(Please to use the numeral 4, 3, 2 or 1 to fill the little square before each question, with 4 as the most relevant, with 3 as relevant, with 2 as not relevant and with 1 as the least relevant.

Please rank the following methods of IMPORTING/EXPORTING educational services for your university/institution; and indicate below each to questions from which/to which countries do you import/export each service. Please mark an "X" if this method is not applicable to your institution).

ڤ traditional classroom training (to foreign students in China or the Chinese students study abroad)

ڤ partnering with foreign university/organization to deliver/receive services

---

ڤ temporary or permanent movement of teachers

ڤ temporary or permanent movement of students/trainees

ڤ distance education via hard or soft copy materials and media such as CD ROM, DVD, video

ڤ Other (please specify)

1.a. What other countries have you identified as potential higher education service import/export markets for China?

1.b. Are there any features of China's domestic laws and regulations affecting the IMPORT/EXPORT of education and training services?

1.c. In your opinion, does GATS legal framework of supply mode in higher education support or undermine autonomous decision-making by the Chinese's higher education institutions?

1.d. Has student mobility from China to other countries increased over the last three years?

1. Significantly □
2. Slightly □
3. Not at all □
4. No, on the contrary it decreased □
5. No information available □

1.e. Has student mobility from other countries to China increased over the last three years?

1. Significantly □
2. Slightly □
3. Not at all □
4. No, on the contrary it decreased □
5. No information available □

1.f. Are there any government actions for removing obstacles (e.g. visa regulations, work permits for students/academics) to mobility?

1. Yes, to promote both staff and student mobility □
2. Yes, mainly to promote staff mobility □
3. Yes, mainly to promote student mobility □
4. There are no obstacles to be dealt with □
5. No actions have been taken □

1.g. What are the main obstacles to the mobility of students and academics from China to other countries?

Q1.g.-1 Financial cost	
Q1.g.-2 Visa restrictions	
Q1.g.-3 Academic recognition issues	
Q1.g.-4 Language barriers	
Q1.g.-5 Others	

COMMENTS

Please use the space below to share with us some of your comments regarding the issue of WTO/GATS in higher education in China's market. Please add any comments and reactions to this questionnaire as well.

THANK YOU VERY MUCH FOR YOUR TIME.

Disclosure Form

The purpose of this study aims to explore the potential benefits and costs of WTO/GATS trade in higher education in China's market on the daily reality of higher education policy-making, academic activities as well as the quality of learning at national level.

The questionnaire is brief and should take about ten to fifteen minutes of your time to complete. Every effort will be made to keep the information provided confidential. Your name does not appear on the questionnaire.

Your cooperation is strictly voluntary and anonynmous.
You may leave any particular questions unanswered or may choose not to complete the questionnaire.
Your participation is very valuable and will contribute to this study. We are most grateful if all participants respond to this questionnaire.

If you have any questions about this study or would be interested in the results, please contact Li-Wen Zhang, telephone 212-963-8929, or by e-mail zhang@un.org.

Thank you for your cooperation.

WTO/GATS TRADE IMPACTS ON CHINA'S HIGHER EDUCATION

QUESTIONNAIRE

The main purpose of this study is to explore the potential benefits and costs of WTO/GATS trade in higher education in China's market in terms of higher education policy-making, academic activities as well as the quality of learning. **We would therefore be most grateful if all participants respond to this questionnaire.** The format of the questionnaire should facilitate rapid completion.

Thank you in advance for your time and contribution to this work.

Group B:Faculty Members

Part I. General Information of Respondents to the Survey

1. Name _____ Sex _____ Age _____

2. Full name of your organization (university, other higher education institution)

_____

3. Address of your organization(s)

_____

Phone:_____ Fax_____ E-Mail_____

4. Type of Organization

e.	State university	□
f.	Policy-making institution	□
g.	University of Applied Science	□
h.	Other (please specify)	□

5. Function of person completing this form (multiple answers possible)

q.	President of University	□
r.	Vice-President of University	□
s.	Dean	□
t.	Dean of Studies	□
u.	Head of Studies	□
v.	International Relations Officer	□
w.	Professor	□
x.	Lecture	□
y.	President of Student Organization	□
z.	Member of Student Organization	□
aa.	Student: Level and field of study	□
bb.	Government Official	□
cc.	Head of Policy-Making Institution	□
dd.	Staff of Policy-Making Institution	□
ee.	Gross annual income (for students please indicate family income)	
ff.	Number of children (for education academics and government officials only)	

2.a. How much priority does your university/institution attach to the development of joint programs between your university/institution and its counterpart(s) in other countries?

1. High	□
2. Medium	□
3. Low	□

2.b. How much priority does your university/institution attach to the development of joint degrees between your university/institution and its counterpart(s) in other countries?

1. High	□
2. Medium	□
3. Low	□

2.c. Does your university/institution welcome the introduction of the Bachelor/Master structure in China?

(Several answers possible; please fill in "*" for each selected choice)

Yes, because:

Q2c-1 It will allow for more flexible, individual learning	
Q2c-2 It will facilitate student mobility	
Q2c-3 It will increase the employability of graduates	
Q2c-4 Other (please specify...)	

2.e. In which subject areas of education do you foresee the most growth in imported and exported transnational education? Please give your reasons. What do you foresee might be the impact of such growth on the different aspects of China's higher education system?

2.f. Do your students returning from study abroad encounter problems with the recognition of their foreign degrees/diplomas?

1. Often (please specify...) ☐
2. Occasionally ☐
3. Never ☐
4. No information available ☐

2.g. In your opinion, do you think that China has institution-wide recognition procedures? (Several answers possible; please fill in "*" for each selected choice)

Q2g.-1 Yes, for the recognition of foreign degrees/diplomas	
Q2g.-2 Yes, for periods of study abroad	
Q2g.3 Yes, for periods of study in joint degree programs in China	
Q2g.4 No, decisions are mostly made on a case-by -case basis	

2.h. What do you see as the role of existing external quality assurance and/or accreditation institutions operating in transnational higher education?

1. Public accountability ☐
2. Enhancing institutional quality culture ☐
3. Improving higher education across the country ☐
4. No important feature ☐

2.I. What is your opinion regarding the academic accreditation of transnational higher education in China?

1. I regard it as very important ☐
2. I regard it as reasonably important ☐
3. I do not regard it as very important ☐
4. I do not have an opinion ☐

2.J. In your opinion concerning the issue of academic quality assurance of transnational higher education in China, is there a need for...?

(Several answers possible; please fill in "" for each selected choice)*

Q2J.-1 A national accreditation agency	
Q2J.-2 A system of mutual recognition between China and accreditation agencies of higher education providing countries	
Q2J.-3 A global accreditation agency	
Q2J.-4 No, there is no such a need	

COMMENTS

Please use the space below to share with us some of your comments regarding the issue of WTO/GATS in higher education in China's market. Please add any comments and reactions to this questionnaire as well.

THANK YOU VERY MUCH FOR YOUR TIME.

Disclosure Form

The purpose of this study aims to explore the potential benefits and costs of WTO/GATS trade in higher education in China.

The questionnaire is brief and should take about ten to fifteen minutes of your time to complete. Every effort will be made to keep the information provided confidential and anonymous.

Your cooperation is strictly voluntary. You may leave any particular questions unanswered or may choose not to complete the questionnaire.

Your participation is very valuable and will contribute to this study. We would therefore be most grateful if all participants respond to this questionnaire.

If you have any questions about this study or would be interested in the results, please contact Li-Wen Zhang, telephone 212-963-8929, or by e-mail zhang@un.org.

WTO/GATS TRADE IMPACTS ON CHINA'S HIGHER EDUCATION

QUESTIONNAIRE

The main purpose of this study is to explore the potential benefits and costs of WTO/GATS trade in higher education in China's market in terms of higher education policy-making, academic activities as well as the quality of learning. **We would therefore be most grateful if all participants respond to this questionnaire.** The format of the questionnaire should facilitate rapid completion.

Thank you in advance for your time and contribution to this work.

Group C: Students

Part I. General Information of Respondents to the Survey

1. Name _____ Sex _____ Age _____

2. Full name of your organization (university, other higher education institution)

_____

3. Address of your organizations

_____

Phone:_____ Fax_____ E-Mail_____

4. Type of Organization

i. State university □
j. Policy-making institution □
k. University of Applied Science □
l. Other (please specify) □

5. Function of person completing this form (multiple answers possible)

gg. President of University □
hh. Vice-President of University □
ii. Dean □
jj. Dean of Studies □
kk. Head of Studies □
ll. International Relations Officer □
mm. Professor □
nn. Lecture □
oo. President of Student Organization □
pp. Member of Student Organization □
qq. Student: Level and field of study □
rr. Government Official □
ss. Head of Policy-Making Institution □
tt. Staff of Policy-Making Institution □
uu. Gross annual income (for students please indicate family income)
vv. Number of children (for education academics and government officials only)

3.a. Are you aware of the present WTO/GATS discussion concerning Higher Education?

1. Yes, fully aware □
2. Yes, but without specific details □
3. Not yet □

3.b. Do you know which bodies in China are involved in dialogue on these WTO/GATS higher education issues?

(Several answers possible; please fill in "*" for each selected choice)

Q3b-1 Ministry of Trade	
Q3b-2 Ministry of Education	
Q3b-3 National Higher Education bodies	
Q3b-4 Other (Please specify…)	

3.c. Do you expect that trade in transnational higher education in China will provide better opportunities for:

1. Students □
2. Higher education system □
3. Higher education institutions □

3.d. In your opinion, will foreign higher education degrees/diplomas bring added value in China's job market?

1. Yes, definitely ☐
2. Probably yes ☐
3. Difficult to say at this stage ☐

COMMENTS

Please use the space below to share with us some of your comments regarding the issue of WTO/GATS in higher education in China's market. Please add any comments and reactions to this questionnaire as well.

THANK YOU VERY MUCH FOR YOUR TIME. PLEASE RETURN THIS QUESTIONNAIRE BY MAIL TO: CENTER OF CHINESE EDUCATION, TEACHERS COLLEGE OF COLUMBIA UNIVERSITY

Disclosure Form

The purpose of this study aims to explore the potential benefits and costs of WTO/GATS trade in higher education in China.

The questionnaire is brief and should take about ten to fifteen minutes of your time to complete. Every effort will be made to keep the information provided confidential and anonymous.

Your cooperation is strictly voluntary. You may leave any particular questions unanswered or may choose not to complete the questionnaire.
Your participation is very valuable and will contribute to this study. We would therefore be most grateful if all participants respond to this questionnaire.

If you have any questions about this study or would be interested in the results, please contact Li-Wen Zhang, telephone 212-963-8929, or by e-mail **zhang@un.org**.

WTO/GATS TRADE IMPACTS ON CHINA'S HIGHER EDUCATION

QUESTIONAIRE

参与同意书

研究说明：为了有效地研究中国作为世界贸易组织新成员，承诺在"服务贸易总协定"的框架下开放中国的高等教育市场的发展问题，兹邀请您参加一项有关的调查研究。本次调研的目的在于通过回答下面两个调查问题来了解人们对服务贸易在开放高教市场方面的认知以及对中国高教市场带来的影响。

参与此项调查将花费您大约 10 到 15 分钟的时间。调查中收集到的全部数据将会加以保密，任何其他人无法取得这些数据。本调查中可能暴露您身份的任何资料都不会具名。

本次调查完全基于您的自愿参与，您不需承担心理或身体上的风险。您有权利不回答那些问题。参与此调查没有任何报酬，您的合作将为此项研究提供宝贵的资料，非常感谢您的合作。

如果您对此调查问卷有任何问题 或希望取得调查结果，请您与张丽雯女士联络，电话 212－963－8929（美国）或通过电子邮件 zhang@un.org

感谢您的合作！

请您将填好的问卷装进准备好的信封内（已贴好邮票）寄出。本调查中可能暴露你身份的任何资料都不会具名。由于时间的限制，麻烦您尽量于一周内寄出。如果您对本次调研还有其他疑问或顾虑，或者想知道本次调研的结果，请与张丽雯女士联系（zhang@un.org）.
你的签名确认你已经阅读提供的信息并同意参加本次调研。非常感谢您的协助。

中国高教服务贸易市场调研
A组
政策制定机构

敬爱的教育界同仁：

我邀请你参加本次调研工作。本次调研将调查中国作为世界贸易组织的新成员在签署"服务贸易总协定"之后开放中国高等教育市场的情况，以及政策制定机构，教育界和大学在校生对这一贸易开放政策的认知。调研对象为三所大学，教育发展研究所以及商务部服务贸易处。烦请各单位领导，教职员及参与此次调研的学生填写这份问卷。填写完毕，请您将填好的问卷装进准备好的信封内（已贴好邮票）寄出。本调查中可能暴露你身份的任何资料都不会具名。由于时间的限制，麻烦您尽量于一周内寄出。如果您对本次调研还有其他疑问或顾虑，或者想知道本次调研的结果，请与张丽娜女士联系（zhang@un.org）。
你的签名确认你已经阅读提供的信息并同意参加本次调研。非常感谢您的协助。

填表者姓名：……（若不愿署名，可以划"X"）
填表者职称：……联系电话：……
填表日期：……

第一部分：总体情况
1．性别
2．年龄
3．机构名称：
地址……电话……传真……电子邮箱……
4．所属机构
A．公立大学
B．政策机构
C．理科院校
D．其它（请详细列明）
5．填写人职称（根据个人情况可填多项选择）
A．大学董事
B．大学付董事
C．校长
D．大学中附属院校的校长
E．教研室主任
F．国际交流办公室负责人
G．教授
H．讲师
I．学生会负责人
J．学生会会员
K．在学年级
L．政府官员
M．政策制定机构领导

N. 政策制定机构工作人员
O. 填表人年收入（学生请注明家庭收入状况）
P. 子女人数（ 仅针对教育工作者和政府工作人员）

关于“服务贸易总协定”开放高等教育市场
中国作为世界贸易组织的新成员国，签署了“服务贸易总协定”并承诺部分开放中国高等教育，职业教育等市场。“服务贸易总协定”在提供教育服务方面 采用四种方式：
跨境提供教育服务（ 如：远程教育）
境外消费（ 如：出国就学）
商业存在（ 如：外国教育机构，大学在中国办的合作授予学位的学业证书）
教育从业人员的跨国流动（ 如：外出讲学，交流，访问等活动）

A 组
政策制定机构
1. 请问您所工作的大学或组织，机构 是以何种方式参与高教贸易化进程的？
（ 请在方框内标明数字，4 表示极有关联，3 表明有关联，2 表明有些关联，1 表明很少关联。请列出如下列举的进口或出口教育服务的国家与地区。如果您所属的单位没有介入高教贸易化，请用 “X” 标记说明）。

－－传统的课堂培训（ 指在中国境内外国留学生 或 在国外求学的中国学生）

－－向国外大学输出或从国外进口高等教育服务

－－教学师资暂时或永久性的跨国流动

－－学生或助教暂时或永久性跨国流动

－－远程教育所用的教学媒体工具，录像，磁碟，光碟。

－－其他（ 请详细说明）

1A. 你认为哪个国家是：中国高教服务贸易的最具潜力的出口市场
中国从其引进高教的进口服务的最佳选择

1B. 你认为中国目前实施的现行法规影响教育服务的进出口活动吗？

1C. 你认为“服务贸易总协定”法律框架下的高教服务贸易提供模式是加强了易或削弱了中国高教政策制定机构的决策权？

1D. 在过去的三年内中国出国留学的人数有所增加吗？
1. 急剧上升
2. 微许上升
3. 没有上升
4. 反而下降
5. 无相关信息

1E. 在过去的三年中外国来华学习的留学生有所增加吗?
1. 急剧上升
2. 些许上升
3. 没有上升
4. 反而下降
5. 无相关信息

1F. 政府采取了哪些措施消除高教服务贸易的障碍(如:在发放入境签证及实施出境护照条例,对外国留学生和来华教学人员的工作许可等方面)
1. 是的,政府鼓励学生和教师的跨国流动
2. 是的,政府鼓励教师的跨国流动
3. 是的,政府鼓励学生的跨国流动
4. 不存在障碍
5. 政府没有采取任何措施消除高教服务贸易障碍

1G. 如下哪些因素你认为是影响中国留学生和高教专业人员进行跨国学习交流活动的最大障碍?
Q1. G-1 经费开支
Q1. G-2 签证限制
Q1. G-3 专业资格的认证问题
Q1. G-4 语言障碍
Q1. G-5 其他 因素(请详细列明)

建议

请您就世界贸易组织关于"服务贸易总协定"开放高等教育市场对中国高教市场的影响简述一下您个人的见解。

.....

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参与同意书

研究说明:为了有效地研究中国作为世界贸易组织新成员,承诺在"服务贸易总协定"的框架下开放中国的高等教育市场的发展问题,烦请您参加一项有关的调查研究。本次调研的目的在于通过回答下面两个调查问题来了解人们对服务贸易在开放高教市场方面的认知以及对中国高教市场带来的影响。

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4

B组
中国高等教育专业人员

敬爱的教育界同仁：

这邀请你参加本次调研工作，本次调研将调查中国作为世界贸易组织的新成员在签署"服务贸易总协定"之后开放中国高等教育市场的情况，以及政策制定机构，教育界和大学在校生对这一贸易开放政策的认知。调研对象为三所大学，教育发展研究所以及商务部服务贸易处。烦请各单位领导，教职员及参与此次调研的学生填写这份问卷。填写完毕，请您将填好的问卷装进准备好的信封内（已贴好邮票）寄出。本调查中可能暴露你身份的任何资料都不会具名，由于时间的限制，麻烦您尽量于一周内寄出。如果您对本次调研还有其他疑问或顾虑，或者想知道本次调研的结果，请与张丽雯女士联系（zhang@tm.org）。
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地址……电话……传真……电子邮箱……
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A。公立大学
B。政策机构
C。理科院校
D。其它（请详细列明）
5。填写人职称（根据个人情况可填多项选择）
A。大学董事
B。大学付董事
C。校长
D。大学中附属院校的校长
E。教研室主任
F。国际交流办公室负责人
G。教授
H。讲师
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关于“服务贸易总协定”开放高等教育市场
中国作为世界贸易组织的新成员国，签署了“服务贸易总协定”并承诺部分开放中国高等教育，职业教育等市场。“服务贸易总协定”在提供教育服务方面 采用四种方式：
跨境提供教育服务（ 如：远程教育）
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商业存在（ 如：外国教育机构，大学在中国办的合作授予学位的学业证书）
教育从业人员的跨国流动（ 如：外出讲学，交流，访问等活动）

B 组
中国高等教育专业人员

2A。你所工作的大学，教研机构在进行与国外相关机构合开课程的活动中持何态度？
1。积极参与
2。态度不明确
3。态度不积极

2B。你所工作的大学，教研机构在进行与国外相关机构合作颁发学历证书的项目一事持何态度？
1。积极参与
2。态度不明确
3。态度不积极

2C。你所工作的大学，教研机构是否欢迎国外的大学或教研机构与你单位合作在中国建立授予学士，硕士学位的合作项目？
是的，因为
Q2C－1 此举为个人就学提供了更多选择
Q2C－2 此举有助于学生毕业后出国继续学业深造
Q2C－3 此举将增加毕业生的就业机会
Q2C－4 其他（ 请详细列明）

2D。依您所见，进口跨国高教和出口跨国高教哪一种势头更趋显著？
A。进口跨国高教
B。出口跨国高教

2E。依您所见，在进口和出口跨国高教市场上哪一类服务贸易现象会在中国高教领域里快速增长的趋势？为什么？你认为这一趋势可能给中国的高教制度带来怎样的冲击？

学位认证问题

2F. 贵校的学生自海外留学归国后有否遭遇所持外国学位受到质疑的情况?
1. 经常发生（请详细说明）
2. 偶有发生
3. 从未发生
4. 没有这方面的信息

2G. 依你所见，中国目前存在系统化，制度化的学历甄别机制吗?（可作多项选择）
Q2G－1 有此机制，可以甄别在国外取得的学历
Q2G－2 有此机制，可以甄别在国外学习的那段时间
Q2G－3 有此机制，可以甄别在中外合办项目中学习的那段时间
Q2G－4 无此机制，采取对个案逐一甄别的形式

对跨国高教的质量保证与质量鉴定

2H. 你如何看待目前国外现有的高教质量保障和鉴别机构在跨国高教中的作用?
1. 显示公共责任
2. 加强高教质量的制度化管理
3. 改良发展中的跨国高教活动
4. 不认为有何重要作用

2I. 你如何看待保证进入中国的跨国高教的质量问题的?
1. 极其重要
2. 一般来说比较重要
3. 不很重要
4. 对此问题无看法

2J. 在考虑保证进入中国高教市场的跨国高教学术质量问题时，你认为需要采取哪些必要措施?（可作多项选择）
Q2J－1 建立中国国家级对跨国高教质量鉴定的机构
Q2J－2 在中国与跨国高教合作伙伴之间的双向质量鉴定机构
Q2J－3 建立全球性的跨国高教质量鉴定机构
Q2J－4 不认为有此需要

建议

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参与同意书

研究说明：为了有效地研究中国作为世界贸易组织新成员，承诺在"服务贸易总协定"的框架下开放中国的高等教育市场的发展问题，在邀请您参加一项有关的调查研究。本次调研的目的在于通过回答下面两个调查问题来了解人们对服务贸易在开放高教市场方面的认知以及对中国高教市场带来的影响。

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C组
学生

敬爱的教育界同仁：

我邀请你参加本次调研工作。本次调研将调查中国作为世界贸易组织的新成员在签署"服务贸易总协定"之后开放中国高等教育市场的情况，以及政策制定机构，教育界和大学在校生对这一贸易开放政策的认知。调研对象为三所大学，教育发展研究所以及商务部服务贸易处。烦请各单位领导，教职员及参与此次调研的学生填写这份问卷。填写完毕，请您将填好的问卷装进准备好的信封内（已贴好邮票）寄出。本调查中可能暴露你身份的任何资料都不会具名，由于时间的限制，麻烦您尽量于一周内寄出，如果您对本次调研还有其他疑问或顾虑，或者想知道本次调研的结果，请与张丽雯女士联系（zhang@un.org）。
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关于"服务贸易总协定"开放高等教育市场

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跨境提供教育服务（如：远程教育）
境外消费（如：出国就学）
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C组

学生

3A. 你是否了解目前世界贸易组织将高等教育列入"服务贸易总协定"的讨论？
1. 完全了解
2. 了解一些情况但是不具体
3. 没有听说

3B. 据你所知，中国在世界贸易组织有关开放高教市场的贸易磋商中如下所列的哪些单位担任主要角色？（可作多项选择）
Q3B－1 贸易部
Q3B－2 教育部
Q3C－3 国内有关高教机构
Q3D－4 其他（请详细列明）

3C. 你认为在中国开放高等教育服务贸易市场会为哪些单位或个人带来更好的机会？
1. 学生
2. 高教系统
3. 高教机构

3D. 你认为国外的高等教育学历或证书对你在中国找工作更具优先价值吗？
1. 绝对是
2. 可能是
3. 不清楚

建议

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APPENDIX III

List of Documents

Three main sets of documents serve the purpose of this study:

A. The Chinese government official documents;
B. The WTO legal documents;
C. Archival documents
   - Education Law of the People's Republic of China;
   - The central government's legislative documents, guidelines official background policy papers on sending students to study abroad;
   - Any bilateral, unilateral and multilateral agreements signed by the Chinese government with other foreign universities, academic research institutions on scholarly exchanges (e.g. agreement signed with the United States in 1978, "Understanding on Student and Scholarly Exchanges");
   - General information and statistics on the Chinese students study overseas (1979-2001);
   - General information and statistics on return students (1990-2001);
   - The central government fund management regulation on returned students (1990-2001);
   - The central government official announcements, conference papers on the issue of returned students;
   - The central government official announcement, conference papers on the issue of China and the WTO;
   - The central government official statements on China's WTO entry;
   - The WTO agreements, the General Agreement on Trade in Services;
   - The central government's official statements on WTO negotiations;
   - The Chinese government's commitment on WTO/GATS;
   - The central government's rules, regulations and guidelines on higher education joint venture programs;
   - National statistics of foreign university branch campuses, joint programs in China (1990-2001);
   - The municipal government's position, regulations, guidelines, action plans and other official conference papers and statements on establishing foreign joint higher education programs;
   - Higher Education Law of the People's Republic of China, 2002;
   - Basic information on the number of students, staff, and faculty involved with the foreign joint higher education programs;
   - General information on subject distribution of those foreign joint higher education programs;
   - Official statistics on enrollment, type of degree granted and quality assurance issues;

- Articles, discussion papers on the issue of WTO/GATS trade in Chinese higher education;
- The Chinese news papers, academic and studnets' discussion on the issue of trade in higher education.

Document Summery Form

Document Form	Document Number
Name and description of documents	
Event or contact, if any, with which documents is associated	
Significance or importance of document	
Brief summery of contents	

Source: Adopted from Miles M. (Qualitative Data Analysis, pp.55)

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