

2006

Chinese Modernization and the Development of Minority Economies

Stephen Bisogno
Seton Hall University

Follow this and additional works at: <https://scholarship.shu.edu/dissertations>

 Part of the [Regional Economics Commons](#)

Recommended Citation

Bisogno, Stephen, "Chinese Modernization and the Development of Minority Economies" (2006). *Seton Hall University Dissertations and Theses (ETDs)*. 763.

<https://scholarship.shu.edu/dissertations/763>

**Chinese Modernization and the
Development of Minority Economies**

Stephen Bisogno

Master's Thesis

Yanzhong Huang, Ph.D. (Adviser)

April 25, 2006

Abstract:

The modernization of China is one of the most fascinating in history. In twenty years, the central government reduced poverty from 90 percent to 10 percent, lifting nearly one-quarter of the world's population out of poverty. Much of the development has been on the eastern coast, where port cities have leveraged their position to export from nearby rural factories. This has caused underdevelopment in western China, which often lacked access to markets, both domestic and foreign. In particular, concern about national minorities and nation integrity has prompted the central government to administer several important development policies in the rural sector. The first was reform of land ownership, which created small plots controlled by local farmers. This policy was critical in helping reduce food scarcity among rural communities. The second "policy" was a series of preferential policies designed to give national minorities greater access to education, government administrative positions, and capital for rural investment. The third policy was the Western Development Strategy (WDS), which intended to reduce poverty in the rural western region, where much of China's national minorities reside. This paper looks at the effect of these policies on reducing poverty in rural national minority communities. In particular, this paper will see if preferential education policies, the WDS, and the liberalization of the residency system have helped minority communities close the income gap with the Han. Attention is focused on Ningxia, where 35 percent of the population is Hui and around 60 percent is Han. The results show that nationally, the western minority provinces, also known as autonomous regions, are not catching up with the eastern coastal provinces. They also show that intraprovincially, the Han communities are maintaining an economic lead in comparison to national minority communities. This indicates that while the centrally administered policies have had a positive economic effect, greater attention must be made to advance the economic standing of western rural communities.

Acknowledgements

I would like give a special thank you to Dr. Yanzhong Huang and Dr. Jason Z. Yin for their support and time during the period of writing, and to Drs. Mauer-Fazio, Hughes, and Zhang for providing further information on their written work to date. I would also like to thank Dr. Pamela Huebner, whose drive and inspiration have helped me progress throughout life and work toward higher levels of academic achievement. I thank my family and friends, both in China and in the US, who inspired me to travel and have given support along the way. Finally, a very big thank you goes to the Yi of Butuo, Sichuan, the Zang near Songpan, Sichuan, the Hui communities in Xian and Shanghai, and the Yao of Jinxiu, Guangxi, each of whom gave me greater understanding of life in China and created a great interest in me to learn more about them and write this paper.

Table of Contents:

List of Tables.....	i
Preface.....	4
I. Introduction.....	4-5
II. Background.....	6-12
III. The Case of Ningxia.....	12-14
IV. Methodology.....	14-17
V. Results	
V.I National Level.....	17-19
V.II County Level.....	20-21
VI. Conclusion.....	22
VII. Appendix: Charts and Graphs.....	23-33
VII. Reference.....	34-36

China's policy of reform and opening [*gaige kaifang*], begun in 1978, has transformed the country from an overly agrarian to very diverse economy. Real Gross Domestic Product (GDP) grew from 8.8 percent in 1997 to 9.5 by 2004 percent¹, and agriculture composed just 13.8 percent of sector GDP compared to industry and manufacturing's 52.9 percent and service's 33 percent.² While *gaige kaifang* reforms have focused on liberalizing barriers to overall entrepreneurship and investment throughout the country, their effect has been particularly felt in the countryside. Initially, rural communities benefited from the reforms. However, central government development policy emphasized eastern coastal development first and an income gap soon developed between the eastern and western provinces. China's national minorities reside primarily in the western provinces. Beginning in the 1980s, the Chinese central government promulgated preferential policies designed to bring national minorities into the economic growth felt elsewhere. Because many of them reside in the west, though, their economic standing often remains far behind eastern residents. Furthermore, an income gap has developed with the west between the minorities and the majority Han, despite the preferential policies. The Western Development Strategy (WDS), developed in 1999 and implemented in 2001, was designed to close the east-west gap. Though the national income gap seems to have grown between eastern and western provinces, have central level investment and preferential national minority policies closed the majority-minority income gap in western China?

I. Introduction

¹ U.S.-China Business Council, *PRC Economic Statistics*, General and Financial Indicators of the People's Republic of China, 2005.

² Central Intelligence Agency, *World Fact Book*, November 2005.

Research on China's national minorities has widespread implications. Though they are a small number in a large country, as an aggregate the national minorities are numerically larger than many countries—about 80 million people. Because of their size, there potential for effecting China's national income and growth levels is high. Furthermore, it is important to study the policies aimed at integrating and promoting the national minorities. As a group that typically resides in the fringe, border areas of China, they have great potential for interacting with foreign actors accessible across international boundaries and which may have detrimental affects on China, such as drug-runners or terrorists.

As mentioned already, the period of *gaige kaifang* has given national minorities a new chance to boost economic wealth via central government market liberalization policies. The decentralization process has (1) allowed greater opportunities for the division of labor within communities, (2) allowed the possibility wealth gained from domestic trade to increase and (3) opened the restrictions on personal movement such that residents can now travel great distances for temporary labor and send the proceeds back to their home. As well, the central level and provincial investment policies pursued during *gaige kaifang* have also generated wealth for rural communities without a doubt. However, it is the extent of the benefit of these investments that needs to be explored more.

In particular, only a handful of studies have really looked into the income disparity between the majority Han and the national minority populations of China. This paper will begin by giving the background, political and economic, of national minority policy and its effects. Following this, I will present the research thus far and what it has concluded regarding national minorities. Then I will introduce my model of research and the results. The final section provides some concluding analysis of the implications these results have.

II. Background

Chinese Central Government economic reform policy has had mixed results. In the 1980's, emphasis was placed on eastern coastal development first, leaving western China's development to lag noticeably behind. For instance, in 1978, China's Gini coefficient for per capita income was a low 0.18, suggesting most of the population had equal amounts of income.³ However, by 2003 the Gini coefficient was 0.45, an indication that nationally income was becoming concentrated among fewer people than before. National minorities have been particularly deficient. Aggregate national minority income has remained around 66 percent of the national average. Since the founding of the People's Republic, central government officials have struggled with the issue of development both economically and politically. While early instituted policies focused on one aspect or the other, post-1978 policies have tried to implement both economic and political reform simultaneously, in an effort to overcome geographic barriers and unite the country.

Throughout its 50-year history, the Chinese government has been concerned about national cohesion via national minority inclusion. The Hui minority, for instance, obtained the first autonomous region in October 1936 in what was called the Hui Autonomous Government of Yuhai County. The county was founded under the guidance of the Chinese Communist Party (CCP), but nonetheless demonstrated the CCP's slant towards giving national minorities special status for political support. After Yuhai, the CCP went on to

³ The Gini Coefficient is used to measure the inequality of a distribution; in this instance it is measuring per capita income. The scale is between 0 and 1, with 1 representing complete inequality. Francesco Sisci, Is China headed for a social 'red alert'?, Asia Times, China Business, October 20, 2005. Available online at http://www.atimes.com/atimes/China_Business/GJ20Cb01.html.

create several autonomous governing regions, including the Inner Mongolia Autonomous Region in 1947, all of which were to be under the guidance of the CCP. What became apparent was that central government national minority policies often had explicit and implicit meanings. For example, by granting the outer lying regions of the west the title of “autonomous,” the government appeased national minority desires for independence and created buffer zones between “inner” China, dominated by the Han, and the remainder of Asia, including the Soviet Union.

Not all policy promoted cultural or ethnic development though. Beginning in 1963, the CCP recognized the value of minority groups in continuing the revolution through a policy of class struggle (Moseley 1965, 2). Central government policy followed the Soviet style of “national in form, Socialist in character.” Through the formal education system, the CCP’ tried to “[do] away with a nationality’s identity while making it appear that this national identity was actually flourishing” (Moseley 1965, 19). However, political policy was tempered with economic growth policy in various periods, though the focus was not exclusively on national minority communities. During the First Five Year Plan (1953-1957) and the Third Front (1966-1975), the second great period of investment, central investment funds flowed mainly to inland central China (predominantly Han areas) as opposed to the far regions of China (predominantly minority areas).⁴ From 1953-1957, China sought to develop its technical expertise. This trailed into the Great Leap Forward, which was a push to industrialize in less than ten years such that China would be equal with the West in terms of industrial capacity. This effort failed and, as previously mentioned, gave way to political cohesion building through political indoctrination policy. During the Cultural Revolution,

⁴ Liaoning, Heilongjiang, Jilin, Henan, Shanxi, Shaanxi, Gansu, Sichuan, Hubei, and Guizhou. For more information see Yeung and Shen, *Developing China’s West* by Yeung and Shen (2004).

the centrally administered Third Front policy focused investment in mountainous areas, intending to reduce the income gap between the western and the eastern portions of the country.⁵ The policy was severely flawed though. First, while investment flowed to the most remote regions, scant attention was given to local comparative advantage. Second, industrialization in remote areas did not connect these areas to more urbanized centers, so that local production remained underutilized. This is evident because while the local per capita income ratio during the First Five-year plan increased, it decreased for the interior, or western, provinces in comparison to the national average during the Third Front. In fact, Barry Naughton (Naughton 2004) contends that the first thirty years of development programs in the People's Republic proved to be failures. Central policy which waxed and waned between ulterior agendas of state security was the culprit.

Previous failure had a positive effect, however. "The shift [in the 1980s] in development strategy was the result of a realistic assessment of the economic situation facing China, and the need to open to the world economy" (Naughton 2004, 257). Furthermore, post-1978 policy reform not only included market reform nationally, but also greater political rights for minorities. There has been a steady increase in central-level protection of national minority culture, the creation of national minority advancement policies and an increase in fiscal allocations to minority regions with the hope of eliminating poverty.

The dissolution of central planning was most noticeable in the rural sector. From 1978 to 1985, the central government reformed its land and agriculture policy, such that farmers could now control individual plots, rather than working as a collective unit. This was

⁵ The Third Front covered Guizhou, Yunnan, Sichuan, Shaanxi, Gansu provinces, and portions of Henan, Hubei and Hunan.

important in overcoming rural food shortages of the “disconnected” by allowing them to grow their own food in accordance with local conditions. In fact, this policy partially solved the food scarcity problem in the countryside. At the same time, in 1984, the central government issued the Law of the People’s Republic of China on Ethnic Regional Autonomy, which set forth political, economic and cultural rights and duties for all minority nationalities. For instance, local self-government, those deemed “autonomous,” is to be composed of both local national minority populations and Han, with a minimum number of minorities at each level. As well, local governing bodies were given the right to enact regulations that meet local political, economic and cultural characteristics, and obtained flexibility in following national laws, though with the approval of “higher state organs.”⁶ This includes such areas as education, for instance the promotion of local ethnic language and culture, marriage and health. Finally, it gave minority areas significant leeway in the planning of economic development, so long as it was within the national development scheme. This marked a significant departure from the Maoist policies, which retarded minority development in all areas. “By the end of 1998, 126 regulations on the exercise of autonomy and 209 separate regulations had been enacted by the autonomous areas.”⁷

The next period of reform was from 1986 to 1993, during which pro-industrialization policies targeting the countryside were created. National minority areas were given special status in central funding and favorable policies with regards to overseas investment. For example, the poverty standard in minority counties was set at below RMB200, as compared

⁶ For more information, see “III. Regional Autonomy for Ethnic Minorities,” available at <http://www.china.org.cn/e-white/4/index.htm>.

⁷ “III. Regional Autonomy for Ethnic Minorities,” Beijing, Information Office of the State Council of the PRC, June 2000. Available at <http://www.china.org.cn/e-white/4/index.htm>

to below RMB150 for Han areas, in 1986, making more households illegible for government preferential loan schemes and education fee supplementation. For the entire country, the results were an 80 percent drop in poverty from 1980 to 1996. By that time, it was at 10 percent. As well, overall rural net income increased more than 3.6 times over this period. However, western provincial GDP growth did not kept pace with national average rate, and national minority income growth remained below the national average.

Poston and Shu (1987), utilizing the 1982 population census, drew a demographic sketch to highlight what made some national minorities more economically successful than others. They concluded that geographic differentiation from the Han was the main factor. Minorities with sub-optimal income levels were located in border regions and in mountains regions. They were disconnected from economic centers which would have provided them access to wealth generating socioeconomic resources. Gustafsson and Li (2003) continued to look at the national minority situation, but through per capita income. They relied on an income survey conducted in 1989 and again in 1995, which presented the opportunity to see if the early reformed period policies—those begun not long before 1982—enhanced the socioeconomic position of national minorities. Within their study, they made several important observations. First, they hypothesized that since the largest number of national minorities resided in the west, it was likely any income disparity would be the result of the central government's focus on eastern economic development during their period of review. Their study found the majority-minority income disparity was spatial, that an income disparity was more likely to occur between regions, particularly between eastern and western provinces. Within regions, the authors discovered central government policies, limited mainly to national minority advancement policies, had reduced the local minority-

majority income gap and, in a few instances, had boosted the income of minorities over that of the local Han. This conclusion supports the theory of disconnectedness from socioeconomic resources cited by Poston and Shu (1987). “Since ethnic minorities are concentrated in the western part of China, the policy of accelerating economic growth in the east could be assumed to have increased the income gap between the minorities and the majority” Gustafsson and Li (2003) (Gustafsson and Li 2003, 808) The authors believe access to markets and education over the seven-year period of study allowed for the marked increase in minority income. For example, they note *gaige kaifang* allowed communities along national borders to engage in cross-border trade with urban centers that were closer in proximity. As well, the lifting of residency restrictions created a “floating population” which could work away from home at higher paying jobs in urban centers, and send income back to their families. Alan P. Liu (1991) identified what he called the “push” and “pull” factors that drove migration. His research, covering the 1980s, showed that liberalization of the *hukou* residency system had contributed to a national migration trend but that most laborers moved to towns within their province or nearby across the border. Furthermore, long-distance migrants were more likely to move from China’s central provinces to the eastern coastal cities afforded “special economic zone” status, while those in the northwest were least likely to migrate out because of local restrictions and the distance traveled. In supplement, Liang (2001) migration patterns according to two surveys conducted in 1989 and 1995. The study supported the theory that migration patterns are far more significant for intraprovincial migrants than for interprovincial migrants in the period studied. Intraprovincial migrants increased by 68 percent from 1987 to 1995 to 10.7 million.

In contrast, interprovincial migration declined by nearly 2 million in the same period to 22.6 million by 1995 (Liang 2001, 508).

Regardless which one had a bigger effect, the fact that positive results were local results suggests the national *gaige kaifang* and localized national minority advancement policies have both had a positive effect on rural minority communities, specifically to the disadvantage of the rural Han. However, by the year 2000, 30 million rural people remained in poverty, or about 3 percent. To eliminate all poverty, officials crafted the Western Development Strategy, which was designed to launch the western China's rapid development. Policy focused on increased foreign direct investment, the building of infrastructure, and increased funding for education in urban areas. Its introduction forces a reassessment of the position of minorities, in order to see what, if any, effect the plan has had on western national minority income.

III. The Case of Ningxia

In their comprehensive assessment of the development of western China, particularly in reference to the Western Development Strategy, Li, Yeung, and Qiao (2004) explored the effect of western development strategies on the western region. They argue that the policies of *gaige kaifang* have been largely responsible for the economic growth in western China.

Between 2000 and 2005, Ningxia ranked third among top performing western provinces by GDP. Table 1 shows that the per capita GDP has significantly improved since 1960 by 2031 percent. In fact, the increase has been most dramatic during the period of national minority and development schemes introduced 1990s.

This can be attributed, according to the authors, to the national policy of *gaige kaifang*, which has allowed the importation and investment of external technology and science, enabling local farmers to overcome farming impediments. In addition to technology, post-1978 development policies have allowed farmers in Ningxia, comprising 4 million persons (65 percent of the provincial population), to take advantage of desert-friendly crops, develop a forestry project to minimize soil erosion, and construct shelterbelts to protect against the wind on the plains. Technology has not only contributed to increases in farming, but also in high-tech industry growth. Primary industry was only 17.30 percent of provincial GDP in 2000, while secondary industry, supported by “emerging and high-tech industries [which] have developed rapidly in Ningxia and have become competitive in domestic and overseas markets,” contributed 45.20 percent (Naughton 2004, 337). Technology has also allowed industry and mining to flourish, giving the region gross output value of RMB293.94 billion in 2004, up from RMB5.01 billion in 1978 and RMB140 million in 1950 (Chaolin, Jianfa, Taofang in Yeung and Shen 2004, 182).

Nationally, the province is still economically weak. Gustafsson and Li (2003) believe that even with the national total rising, regional economies may not be approaching national income levels. This is supported by a comparison of GDP contribution. Pitted against the national GDP in 2000, Ningxia contributed 1.59 percent, or RMB26.6 billion of the total (Yeung and Shen 2004, 60). It is worth noting that although Ningxia’s growth and level of income ranked third best among western provinces, it was among the lowest percentages nationally that year. According to the authors, in 1988, per capita income was RMB150 behind the majority income of RMB782. This disparity grew to RMB767 by 1995, with a national Han average of RMB1, 196 (Gustafsson and Li 2003, 810).

Maurer-Fazio, *et al.* (2004), continued to look at income disparity, but through variables other than income level. In particular, they used Labor Force Participation (LFP) and disaggregated all minorities for their analysis. They found that LFP for Hui in “professional, technical, and administrative positions” was just over 8 percent, higher than the nearly 7.75 percent participation rate for the majority Han in 2000. When including other sectors, the Hui lost ground to the Han, as, in 1982, they participated in just below 80 percent of the labor force. By 2000, the Hui participation percentage declined to below 75 percent, while the Han remained above 75 percent.

Understanding how this explains the Hui division of labor and key economic contributors is not easy. For instance, understanding the relationship between growth in the technology sector in Ningxia and the likelihood that local Hui are occupying “professional, technical, and administrative positions” in this industry is difficult to ascertain. Second, as Mauer-Fazio, *et al.* (2004) contend, the increase in income for national minorities has allowed many families to return to more traditional structures, in which the women perform unofficial labor closer to home. This second induction is perhaps the reason why GDP per capita remains well below of more eastern regions, where both spouses work. However, from 1994 until 1999, women have been playing larger roles in industries such as banking, health care, real estate and media.

The remaining question is whether the position of Hui in all regions is improving, as noted in part in Mauer-Fazio *et al.* or if the Ningxia Hui are in a unique position to succeed due to geographic reasons.

IV. Methodology

This paper has presented a historical overview of central policies in order to clarify the question have national minorities benefited from the pro-development plans and preferential policies implemented during *gaige kaifang*. The deficit of research on this issue and the position of minorities in China since 1978 as told thus far prompts the need for more work. Because previous efforts have identified the problem as being spatial, I will continue to look at location as a determinant of economic growth and limit my research to 1995 to 2004.

I will measure the economic status of the Hui and Han by using GDP per capita. Though other researchers have used income per capita or labor force participation rate, these studies are restricted to the census data which was last conducted in 2000. By using GDP per capita, a more liberal analysis can be conducted which looks at the period in question and encompasses the overlying influence, the Western Development Plan. I use per capita central government expenditure on capital construction and urban and rural population numbers to test against GDP. These were chosen because it is believed that (1) government capital expenditure is the key focus of the development plan and (2) if overall expenditure does not cause an increase in per capita GDP, then it can be determined if urbanization, a result of increased capital expenditure, shows a correlation to increased per capita GDP.

I will also look at educational attainment in a provincial comparison and enrollment in a county comparison. Preferential policies since 1990 have focused on getting more national minorities into institutions of higher learning, as well as increasing the number of those in primary education. If economic growth is not the result of national capital

construction investment, then this will help see if the social policies have any relationship to increases or decreases in per capita income.

For my two cases I have focus on Ningxia. Ningxia had a population of roughly 56 million, 34 percent of whom were Hui in 2004. This is the largest concentration of Hui in China, further discussion can be found in the work of Poston and Shu (1987) who showed the Hui have a dispersion rate of .914. Due to the scale of studying numerous Hui populations across 20 provinces, Ningxia presented the chance to study a concentration of the minority in a unique setting. First, the province is listed among China's 13 underdeveloped western provinces. Second, the Ningxia Hui comprise 36 percent of the total provincial population and around 17 of the national Hui population (Shen and Wang in Yueng and Shen 2004, 228). While it is not a representative number of the total national minority population, its extremely large number of Hui makes it a good case to review the position of one group. Additionally, Ningxia is an autonomous region for the Hui. This means they hold key positions in the government at which they can effect economic policy change favorable to local conditions. It may also mean that they are less likely to be discriminated against for high-level positions in firms, so their income would likely be higher.

A key similarity is that both provinces were part of the WDS. If an increase in one province did not equal an increase in GDP per capita in another, then perhaps capital expenditure during the WDS period did not have a significant impact. As well, both provinces face similar topographical conditions, which means the type of industry located in each province may be similar, and the if there is a greater gain in GDP in one province

over the other, regional differentiation will be less significant. Finally, both provinces are also included in the “new socialist countryside” initiative.

The second analysis will look inside Ningxia at the county level, disaggregating Han and Hui dominant counties. Due to data availability not all counties were selected. These counties, cities or districts are Yinchuan city, Shizuishan city, Wuzhong city, Litong district, and Yuanzhou district. These areas, according to the 2002 census, accounted for 32 percent of the Ningxia population, or 1,842,590 persons, leaving 3,872,786 persons under consideration for the province in this year. Thus the county level analysis will look at the period of 2000 to 2003, or four years. Cutting down the number of areas analyzed incidentally should give a boost to the Hui population. Each of the areas withheld are predominantly Han, except for Litong district, which was 54 percent Hui in 2002.

Establishing which counties to count as Hui is set at a 50 percent threshold. This number may seem rather low, but the percentage of Hui in the majority of counties is far lower than this. Therefore, by selecting 50 percent, and given that Ningxia is a Hui autonomous province, I believe together these two factors provide sufficient weight to consider these provinces representational. It should be noted that according to the 2002 Ningxia census, 49.49 percent of provincial Hui resided in “mountainous” regions, while only 24.22 percent resided in province for a county considered “Hui dominant.”

There are several limitations to this study. Most of the data is taken from the China National Bureau of Statistics available collectively at the University of Michigan’s ChinaData Online. While the variables under review are not exactly the same as those used in prior studies, it is the most obtainable and relevant data for the period under review. However, data for all Ningxia counties from 2004 were unattainable at the time of writing.

As well, data from 1995 to 2000 was hard to obtain. In lieu of this missing data, I have used the population surveys from 1995, 2000, 2001, 2002, 2003 and 2004. Though it neglects a long-term trend, the numbers are sufficient to show a trend for the period under analysis.

V. Results

V.I National Level

The first question is the status of the per capita GDP gap between the minorities and majority. Graph 1 shows the average for all Han non-autonomous region provinces and municipalities and for Ningxia as a whole.⁸ In 1995, Ningxia's per capita was roughly RMB3,000 less than the 26 Region average. However, by 2004 the gap increased to nearly RMB7,000 below the average. It is clear, therefore, the gap between minority provinces and Han provinces is increasing. Graph 1b helps clarify the composition of this phenomenon. As would be assumed, a coastal city, Shanghai, is at the top of composite. In 2004, the city had a per capita of RMB55,307, almost RMB20,000 greater than Beijing. Gansu occupied the bottom, with a per capita GDP of RMB5,970. This is an interesting finding, because Gansu's capital city, Lanzhou, is generally more developed than Ningxia's cities, given that it is a transportation hub between Xinjiang the eastern portions of China, is home to oil refining, and is the base for China's atomic energy industry. The nature of the gap, therefore, is most likely between the eastern and western provinces, as previous studies have found.

⁸ I selected the non-autonomous regions in order to compare the performance of the Ningxia Hui against regions that don't have any special status and are dominated by the Han. The counties are: Beijing, Tianjin, Hebei, Shanxi, Liaoning, Jilin, Heilongjiang, Shanghai, Jiangsu, Zhejiang, Anhui, Fujian, Jiangxi, Shandong, Henan, Hunan, Guangdong, Hainan, Chongqing, Sichuan, Yunnan, Shaanxi, Gansu, and Qinghai.

The first test is whether funds from the Western Development Strategy, released in 2001, had an effect on Ningxia's GDP. Graph 2 shows two lines, one for the amount of centrally administered capital investment (per capita) and one for the per capita GDP. Predictably, there is a massive increase in capital construction expenditure in 2001 in the province. Per capita GDP increased from RMB1694 in 2000 to RMB4313 in 2001. Subsequently, spending decreased slightly, because once the buildings and other infrastructure were built, there was less of a need for maintaining the same level of investment. By comparing Graphs 1 and 2, we see the following: 1) Ningxia's GDP increased at a rate slower than the 26 region average; and 2) the gap between the minority provinces and majority provinces depends is national in nature, that location within China plays an important role in determining provincial economic performance. However, investment did play an important role. A correlation coefficient test reveals a significance of 0.80, suggesting investment and GDP, during the period under analysis, were have a strong, positive relationship.

As previously discussed, the liberalization of the *hukou* system resulted in a large movement of workers from the west to the east, where they have worked in temporary positions or those requiring few skills. Regarding Ningxia, if a mass population migration out of Ningxia had occurred in the in the late 1990's, there would a reflection of this in the 2000s. For instance, production might have declined, because typically the workers who leave to find jobs are more skilled than the workers that remain behind. With low-skilled workers prominent, production would have declined. Graph 3 shows Ningxia's per capita GDP and the provincial population. The increase in provincial population from 1995 to 2004 is at a rate less than the rate of increase for the per capita GDP. A statistical

significance test reveals that the two have a correlation coefficient of 0.73, or a positive and relatively strong relationship. Looking at it another way, in the late 1990s, the per capita GDP percent change from the previous year ranged from 5 percent to 8 percent. After 2001, the per capita GDP percent change ranged from 10 percent to 18 percent, indicating a progressively rapid increase in the per capita GDP rate. Respectively, the population increase in both periods has remained around 1 percent to 2 percent per year. The result of this analysis suggests that there was not a mass migration inward nor outward from Ningxia, but rather that the increase in GDP was the result of increased intraprovincial productivity.

V.II County Level

In further exploration of a minority-majority income gap, I turn to an inter-provincial analysis of Ningxia's counties. If the provincial trend was an increase in per capita GDP, it is important to disaggregate the Han communities from the Hui communities in order to see if the trend is true across all counties.

Graph 4 shows the four-year trend, 2000 to 2003, for per capita GDP across Han and Hui counties. The results show that the Han counties saw an increase in per capita GDP all four years, with a rapid increase from 2002 to 2003. Conversely, the Hui counties experienced a much steadier increase of this period. Tables 2 and 2b further explain these trends. The per capita in Hui counties increased roughly 15 percent from 2001 to 2003. In comparison, the Han counties show an average increase of 10 percent the first two years and an incredible 24 percent increase between 2002 and 2003. This trend may be explained by the fact that the Han tend to reside in more urban centers, while the Hui are located in

more rural areas. The WDS focused attention on developing western urban centers, so the increase in the Han counties may be due to this development policy.

The next test analyzes population movement between Han and Hui counties, to see if significant migrations have occurred. Table 3 tracks the population movement from 1998, the earliest date with available data, in order to show a broader picture of movement. The population of the Han counties, over this 6-year period, appears to remain nearly constant. Conversely, the population in Hui counties demonstrated noticeable increases every year, except 2002. From 1999 to 2003 the average percent change in population for all Hui counties (Jingyuan, Tongxin, Haiyuan, Xiji) was 1 percent, while in Han counties (Yongning, Helan, Lingwu, Pingluo, Taole, Huinong, Qingtongxia, Zhongwei, Zhongning, Yanchi, Guyuan, Longde, and Pengyang) it was also 1 percent. It can be concluded that over the period under analysis, there has not been a large population migration between counties. If this is true, then perhaps the low rate of increase in Hui per capita GDP is the result of an unproductive population.

When disaggregated into urban and rural regions, we see that between 1998 and 2003, over 75 percent of the population in each national minority county was classified rural. It is likely then, that the natural urban/rural productivity gap, in which the GDP is likely to be higher in higher output urban regions, rather than rural regions, helps explain why the per capita GDP is lower in minority areas. The national investment scheme, therefore did not help to improve the minority-majority income gap intraprovincially, but actually increased it. However, other variables must be accounted for.

The preferential policies, as mentioned, have lowered the standards for minorities to enter secondary schools and universities. As well, there has been an increase the number of

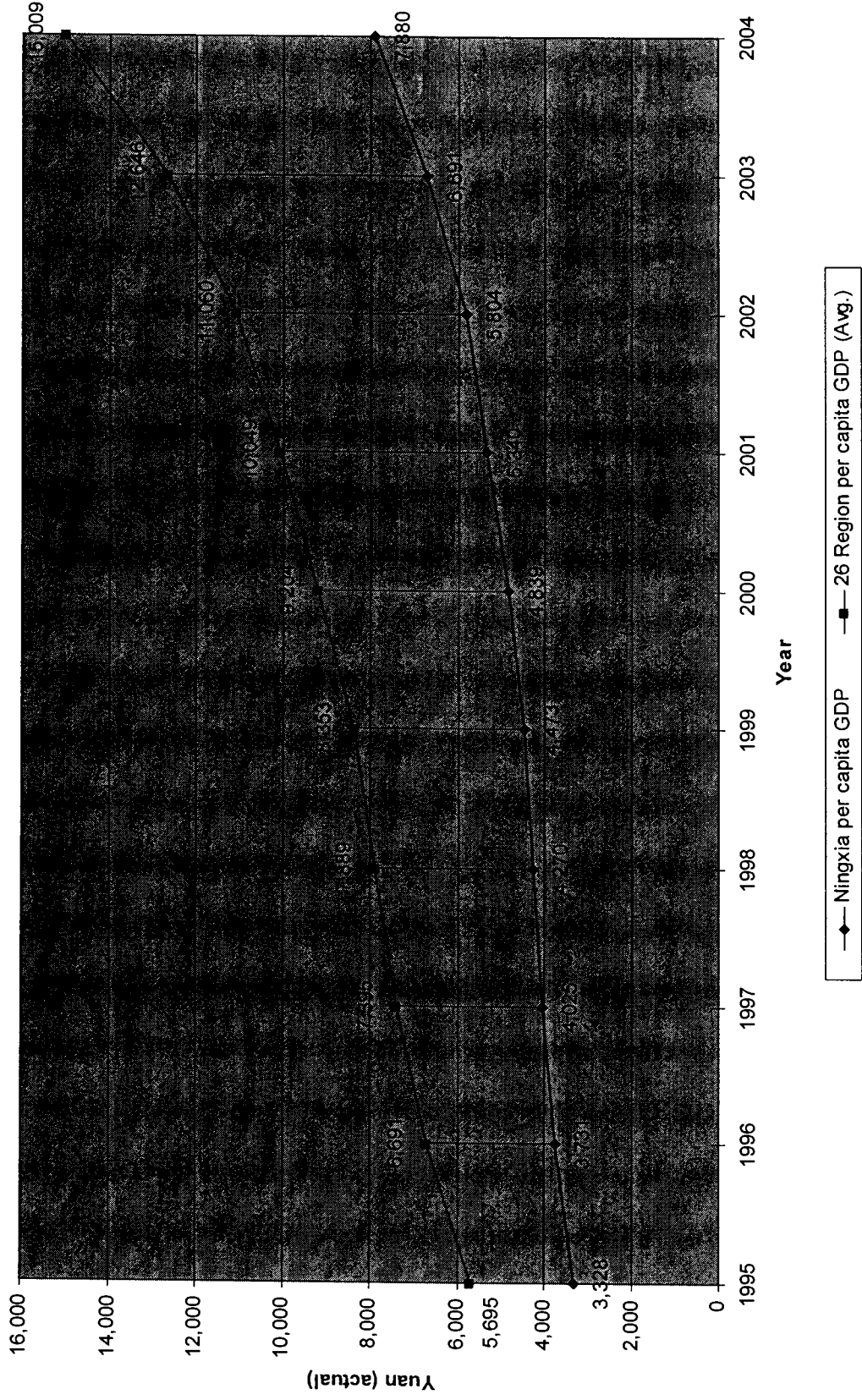
school buildings in rural areas where minorities reside. Table 4, 4b, and 4c show the number of enrolled students by county from 2000 to 2003. The number of students enrolled in primary and secondary education in Han counties remained nearly constant over the four-year period. In contrast, the number of enrolled students in Hui counties increased year upon year, with the largest increase in 2003. The dispersion of enrollment between the two types of counties shows the number of students attending secondary in Han counties is greater in proportion to the number of those attending secondary school in Hui counties, however. While more Hui may be going to secondary school and continuing into institutions of higher education, the numbers show that in fact they remain largely low educated, at least in western China.

VI. Conclusion

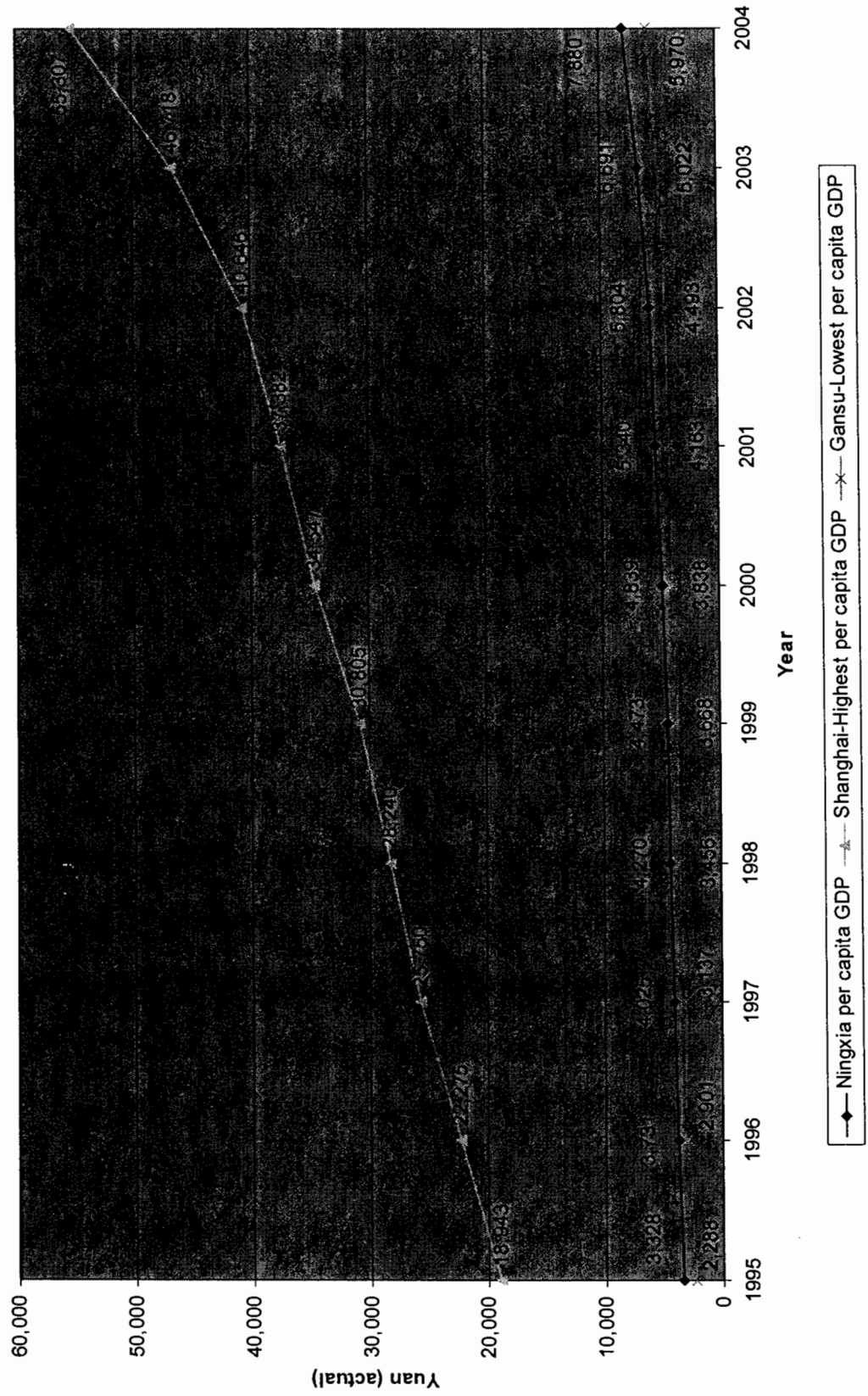
In conclusion, it appears that China's preferential policies for national minorities have not had a strong impact on minority communities. However, the capital construction focus of the WDS does show a relationship to the increase in Ningxia's Han county per capita GDP rise. This is because of the policy emphasis on developing western urban centers, not rural communities. Future central level policies should devote resources to improving the educational opportunities in western minority communities, building the foundation for future market development.

VII. Charts and Graphs

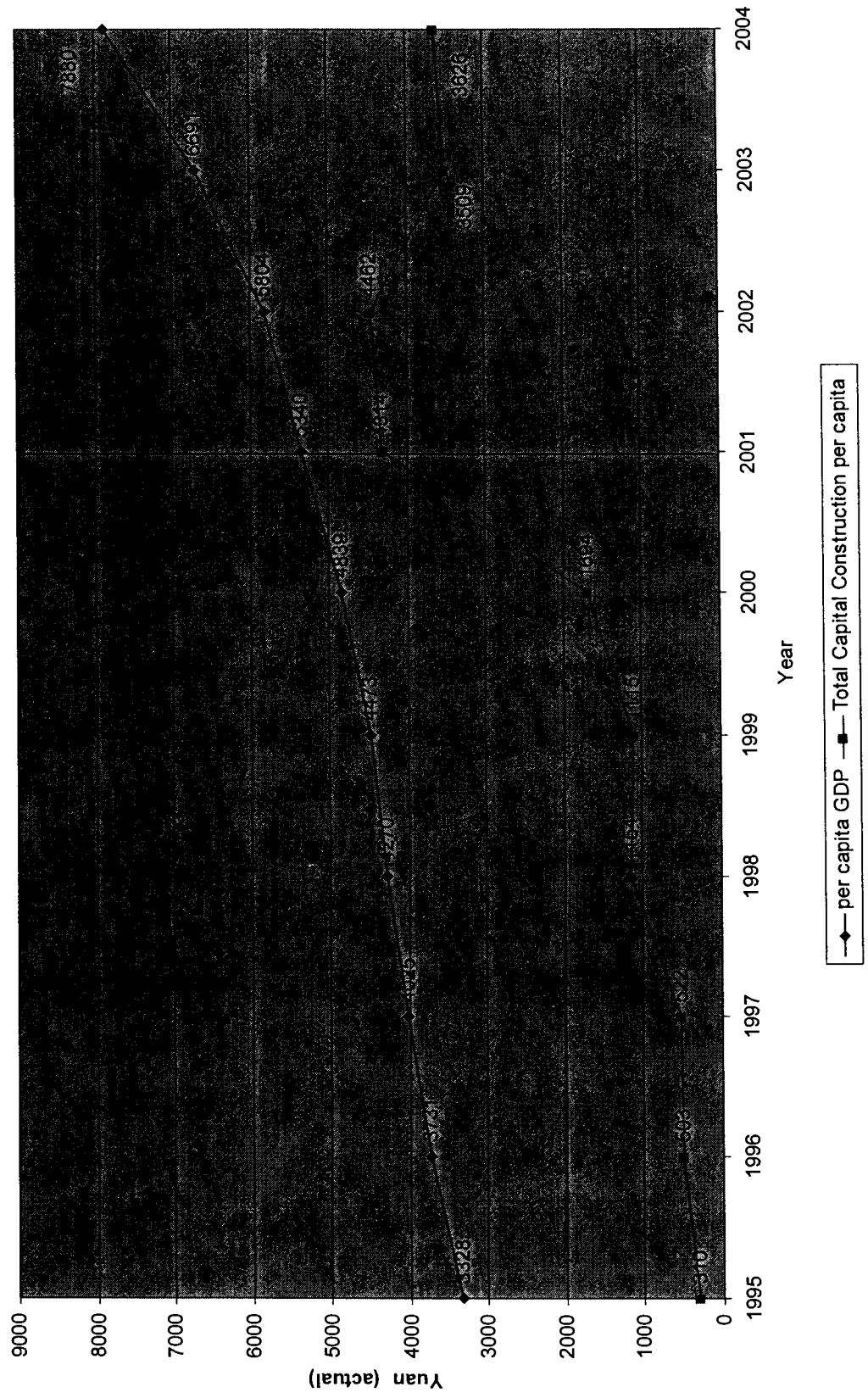
Graph 1: Ningxia/26 Region per capita GDP Comparison



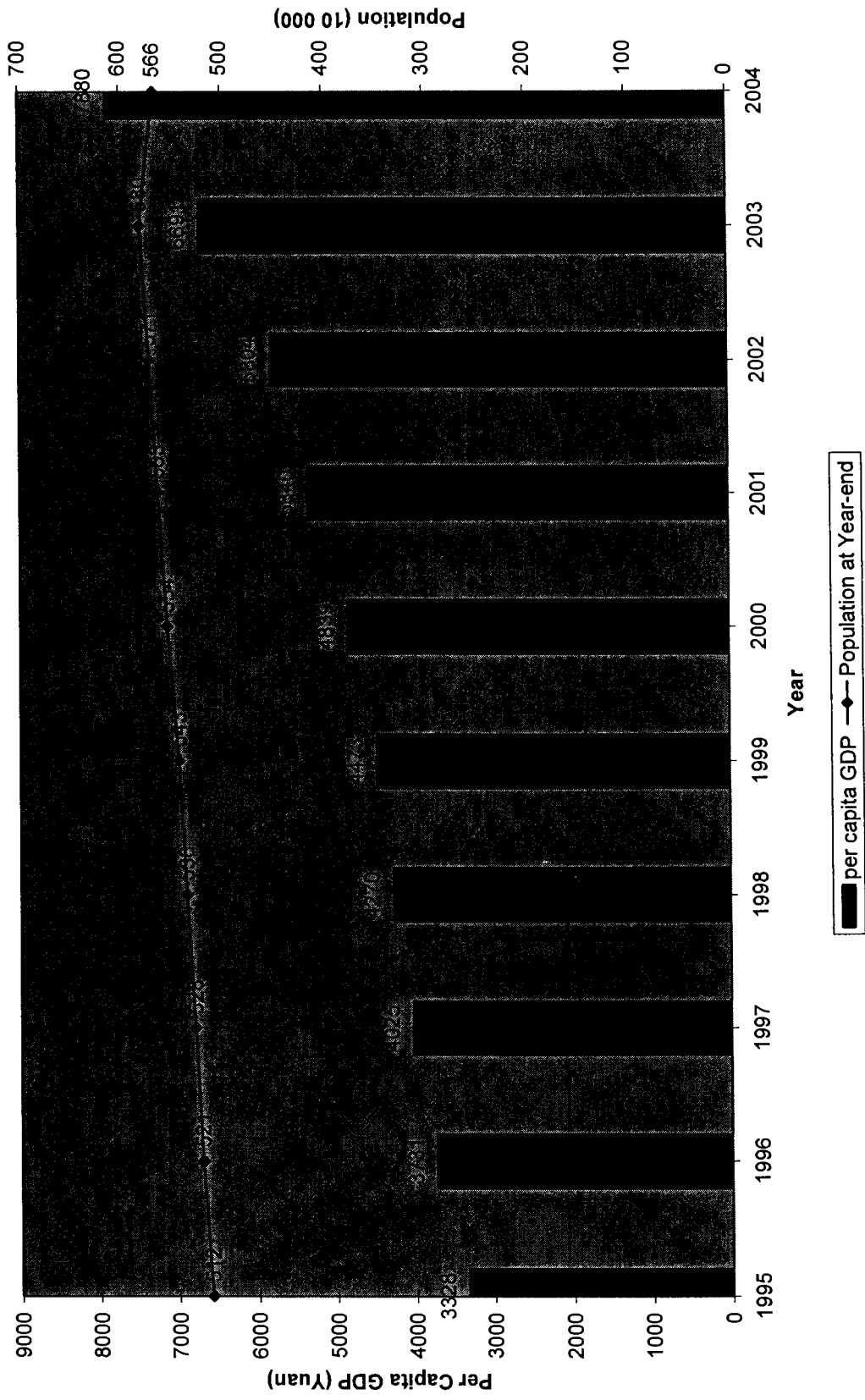
Graph 1b: Range of per capita GDP



Graph 2: Ningxia GDP/Capital Construction per capita



Graph 3: Ningxia Population and per capita GDP



Graph 4: Han & Hui County Average GDP & Capital Construction per capita

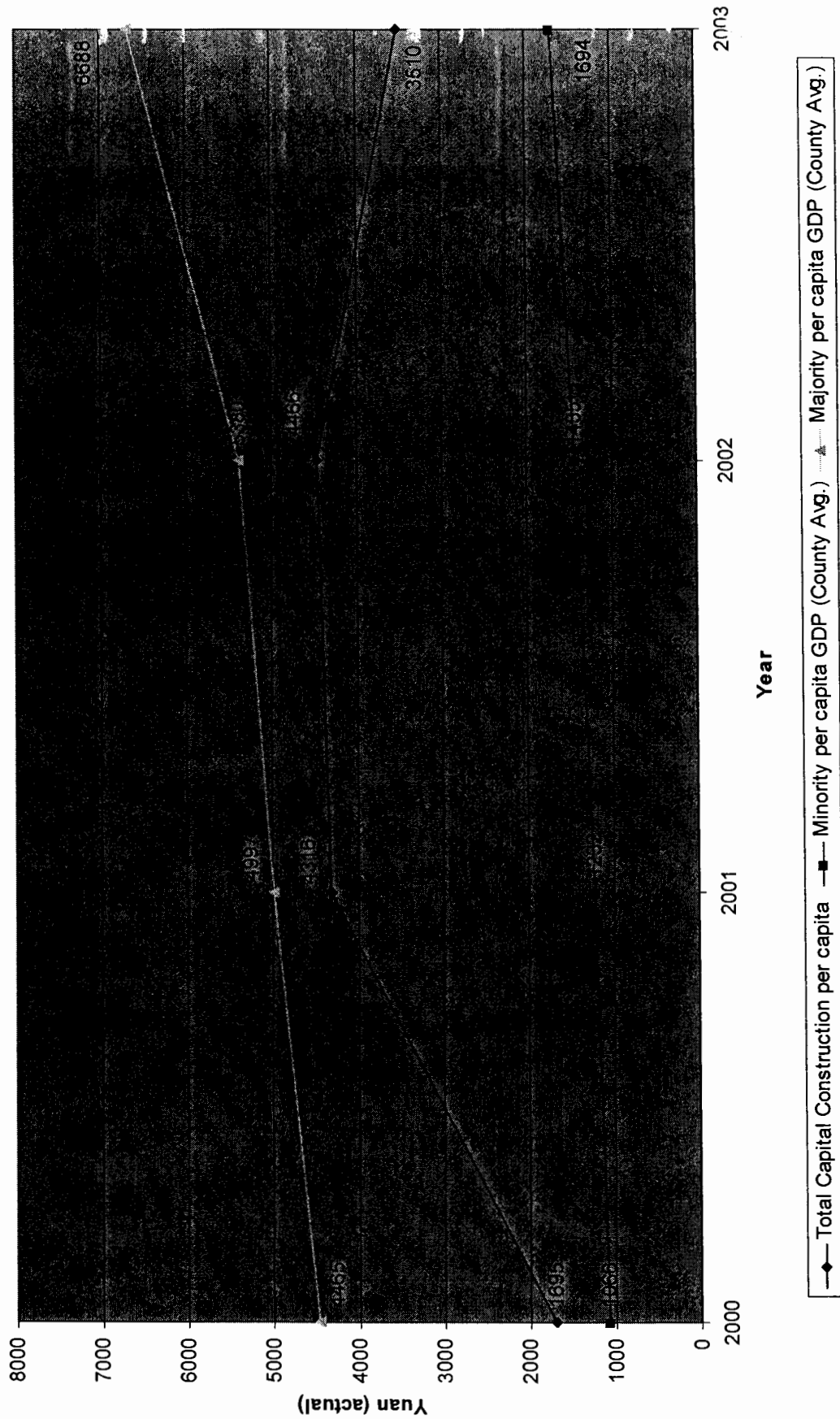


Table 1: Ningxia GDP per Capita (1960-2000)

Year	Per Capita	% increase
	GDP (Yuan)	
1960	227	-
1970	241	6
1980	433	80
1990	1,393	222
2000	4,839	247

Data provided by All China Marketing Research. Available online at <http://141.211.142.27/>.

Table 2: Total Ningxia Han County per capita GDP (Yuan)

County/Year	2000	2001	2002	2003
Yongning	5878	5908	6389	7481.45
Helan	5081	5643	5602	6557
Lingwu	5296	5674	6077	7834
Pingluo	429	4672	5005	5989
Taole	3756	4303	4597	6190
Huinong	6041	6720	7194	9435
Qingtonxia	9278	9936	11294	13181
Zhongwei	4077	4675	5243	6131
Zhongning	3511	4141	4670	5841
Yanchi	6663	8384	8218	11298
Guyuan	1381	1741	2003	2735
Longde	1695	1816	2007	2435
Pengyang	1094	1346	1636	1842
Total	58050	64965	69940	86953
Majority Avg.	4465	4997	5380	6688

Data provided by All China Marketing Research. Available online at <http://141.211.142.27/>.

Table 2b: Total Ningxia Hui Minority County per capita GDP (Yuan)

County/Year	2000	2001	2002	2003
Tongxin	1410	1492	1889	2065
Haiyuan	982	1159	1512	1610
Xiji	850	1010	1130	1402
Jingyuan	1023	1267	1208	1697
Total	4267	4929	5741	6776
Minority Avg.	1066	1232	1435	1694

Data provided by All China Marketing Research. Available online at <http://141.211.142.27/>.

Table 3: Ningxia-County Han/Hui Total & Avg. Population (10 000)

County/Year	1998	1999	2000	2001	2002	2003
Guyuan	51	51.7	50.8	51	51.9	49
Yongning	18	18.3	18.5	20	20.4	20
Helan	18	17.7	18.3	18	18.7	18
Pingluo	26	26	26.1	26	26.6	27
Taole	2	3	3.1	3	3.1	3
Huinong	7	8	7.4	7	7.6	7
Zhongwei	33	33	33.1	34	33.9	35
Zhongning	23	22.9	25.8	26	26.1	27
Yanchi	15	15.2	15.2	15	15.5	16
Qingtongxia	24	24.4	24.8	25	25	25
Lingwu	25	25.7	25.5	26	26.3	23
Longde	21	21.7	21.7	22	21.7	21
Pengyang	25	24.9	24.5	25	24.7	25
Total	288	292.5	294.8	298	301.5	296
Avg.	22	23	23	23	23	23
Xiji	-	-	45.2	45	45.3	46
Tongxin	35	35.8	36.4	37	34	35
Haiyuan	37	37.1	36.4	37	37.3	38
Jingyuan	11	11	8.2	8	8.2	12
Total	83	83.9	126.2	127	124.8	131
Avg.	28	28	32	32	31	33

Data provided by All China Marketing Research. Available online at <http://141.211.142.27/>.

Table 4: Ningxia-Han County Student Enrollment in (person)

Type→	Regular Secondary Schools	Primary Schools	Regular Secondary Schools	Primary Schools	Regular Secondary Schools	Primary Schools	Regular Secondary Schools	Primary Schools	Regular Secondary Schools	Primary Schools
<u>County/Year</u>	<u>2000</u>	<u>2000</u>	<u>2001</u>	<u>2001</u>	<u>2002</u>	<u>2002</u>	<u>2003</u>	<u>2003</u>	<u>2003</u>	<u>2003</u>
Yongning	10784	22018	12223	23403	13079	21951	13885	21025	13885	21025
Helan	10720	19321	11155	18823	12013	18229	12512	16681	12512	16681
Pingluo	17236	24204	17340	24310	17400	24410	18119	23204	18119	23204
Taole	1745	3991	1869	3765	2055	3953	2095	4002	2095	4002
Huinong	3898	5934	3482	5939	3562	5619	4051	5525	4051	5525
Zhongwei	24694	34932	26774	33586	27543	33229	29460	35500	29460	35500
Zhongning	20991	30167	21410	29114	22502	28509	21919	30197	21919	30197
Yanchi	10783	17339	11264	17394	12860	17561	14160	16956	14160	16956
Qingtongxia	15956	22808	13897	24345	12479	30533	19623	25398	19623	25398
Lingwu	15683	25933	16866	24468	18061	23905	11651	19936	11651	19936
Guyuan	26681	68541	29124	68120	32797	68508	31928	63204	31928	63204
Pengyang	14844	32316	14844	32316	13318	28902	18978	28610	18978	28610

Data provided by All China Marketing Research. Available online at <http://141.211.142.27/>.

Table 4b: Ningxia-Hui County Student Enrollment (person)

Type→	Regular Secondary Schools	Primary Schools	Regular Secondary Schools	Primary Schools	Regular Secondary Schools	Primary Schools	Regular Secondary Schools	Primary Schools
<u>County/Year</u>	<u>2000</u>	<u>2000</u>	<u>2001</u>	<u>2001</u>	<u>2002</u>	<u>2002</u>	<u>2003</u>	<u>2003</u>
Tongxin	13979	51991	15038	49085	15628	50716	15496	55070
Xiji	19818	66421	20330	67447	23297	68010	22918	68307
Longde	13671	30013	13660	29078	16186	28148	19414	28228
Jingyuan	1742	11187	1851	12231	2176	10963	3497	15182

Data provided by All China Marketing Research. Available online at <http://141.211.142.27/>.

Table 4c: Ningxia Provincial Han-Hui County Education Enrollment (person)

Type →	Regular Secondary Schools	Primary Schools	Regular Secondary Schools	Primary Schools	Regular Secondary Schools	Primary Schools	Regular Secondary Schools	Primary Schools
Overall	14,501	25,625	15,021	25,465	15,639	25,442	16,532	24,187
Han Avg.	12,303	39,903	12,720	39,460	14,322	39,459	15,331	41,697
Hui Avg. Total								
Hui Avg. Total								

Bibliography

A. Periodicals and Books

Gustafsson, Bjoern, and Li Shi. 2003. The Ethnic Minority-Majority Income Gap in Rural China during Transition. *Economic Development and Cultural Change* Vol. 51, No. 4 (July): 805-822.

Hannum, Emily, and Yu Xie. 1998. Ethnic Stratification in Northwest China: Occupational Differences between Han Chinese and National Minorities in Xinjiang, 1982-1990. *Demography* Vol. 35, No. 3 (August): 323-333.

Heberer, Thomas. China's Nationalities Policies: Quo Vadis? Casa Asia, III Asia Forum. Available at: <http://www.casaasia.es/pdf/21904105720AM1077184640713.pdf>

Liang, Zai. 2001. The Age of Migration in China. *Population and Development Review*, Vol. 27, No. 3 (September 2001): pp. 499-524.

Liu, Alan P. L. 1991. Economic Reform, Mobility Strategies, and National Integration in China. *Asian Survey* Vol. 31, No. 5 (May): 393-408.

Moseley G. 1965. China's Fresh Approach to the National Minority Question. *The China Quarterly*, No. 24 (1965): 15-27.

Maurer-Fazio, Margaret, James W. Hughes, and Dandan Zhang. 2004. "The Economic Status of China's Ethnic Minorities." Preliminary draft for International Research Conference: Poverty, Inequality, Labour Market and Welfare Reform in China, Australia University, August 25-27 2004.

Naughton, Barry and Dali Yang, "The Western Development Program," in Barry Naughton and Dali Yang, eds., *Holding China Together: Diversity and National Integration in the Post-Deng Era* (New York: Cambridge University Press 2004).

Poston Jr., Dudley L., and Jing Shu. 1987. The Demographic and Socioeconomic Composition of China's Ethnic Minorities. *Population and Development Review* Vol. 13, No. 4 (December): 703-720.

Rozelle, Scott D. 2001. Trade and Investment Liberalization and China's Rural Economy: Impacts Policy Responses. Faculty Working Paper 01'016, Department of Agriculture and Resources Economics, University of California, Davis.

Sautmann, Barry. 1999. Ethnic Law and Minority Rights in China: Progress and Constraints. *Law and Policy* Vol. 21, No. 3 (July): 283-314.

Woo, Wing Thye. 1999. The Real Reasons for China's Growth. *The China Journal* 41 (January): 115-137.

Y.M. Yeung and Shen Jianfa, eds., *Developing China's West: A Critical Path to Balanced National Development* (Shatin, N.T., Hong Kong: The Chinese University Press of Hong Kong, 2004).

Yeh, K.C. 1992. Macroeconomic Issues in China in the 1990s. *The China Quarterly* 131, Special Issue. (September): 501-544.

B. Chinese Government Sources and US Government Reports

Congressional-Executive Commission on China, *Human Rights and Rule of Law in China*. Washington, DC: last updated April 7 2005.

Available at: <http://www.cecc.gov/pages/virtualAcad/hrrolindex.php>

Information Office of the State Council of the People's Republic of China, *Regional Autonomy for Ethnic Minorities in China*, White Paper. Beijing, China: February 2005.

Available at: <http://www.china.org.cn/e-white/20050301/index.htm>

Information Office of the State Council of the People's Republic of China, *National Minorities Policy and Its Practice in China*, White Paper. Beijing, China: June 2000.

Available at: <http://www.china.org.cn/e-white/4/index.htm>

Information Office of the State Council of the People's Republic of China, *China's population and Development in the 21st Century*, White Paper. Beijing, China: December 2000. Available at: <http://www.china.org.cn/e-white/21st/index.htm>