

2014

BioTechnology

An Indian Journal

FULL PAPER

BTAIJ, 10(8), 2014 [2395-2403]

The human resources development research after demographic dividend turning point

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ABSTRACT

China's rapid economic growth is inseparable from the contribution of the demographic dividend, but the reduction of the initial demographic dividend does not mean that there is no potential demographic dividend. Therefore, strengthen the development and utilization of human resources, formulate the policies of rational human resources, optimize human resources structure, reasonably develop potential demographic dividend, are the inevitable courses to ensure the healthy development of China's economy.

KEYWORDS

Demographic dividend turning point; Human resources development.



INTRODUCTION

Thirty years has passed, due to history and policy reasons, China ushered in a golden era of unprecedented demographic dividend, in these years, with the great advantage arising on various labor by demographic dividend, China's major industries have been developed rapidly, especially the second industry. However, most of China's labor force are physical and mental aspects by low value-added labor-based industries, occupying at a lower position in the international manufacturing division chain. Till now, this phenomenon has become the bottleneck of the development – due to the lack of high-quality labor force, the labor shortage occurred, which has become a stumbling block of development with social and economic development to people's living standards. The phenomenon is not only conducive to improve the living standards, but also limit the potential development of human resources, thereby hinder China's industrial upgrading. In this regard, many scholars believe that China's demographic dividend is slowly disappearing. But I do not think so, to achieve industrial upgrading and enhance the status of the various industries in the global industrial chain division, we can only rely on reform and management of human resources. Optimizing the infrastructure in Secondary industry is the only way to upgrade industries, promote the Chinese enterprises in the global division of labor sectors, human resource development is the key to realize the industry upgrades.

HISTORY AND CURRENT SITUATION ANALYSIS OF CHINA'S DEMOGRAPHIC DIVIDEND.

The concept and characteristics of the demographic dividend.

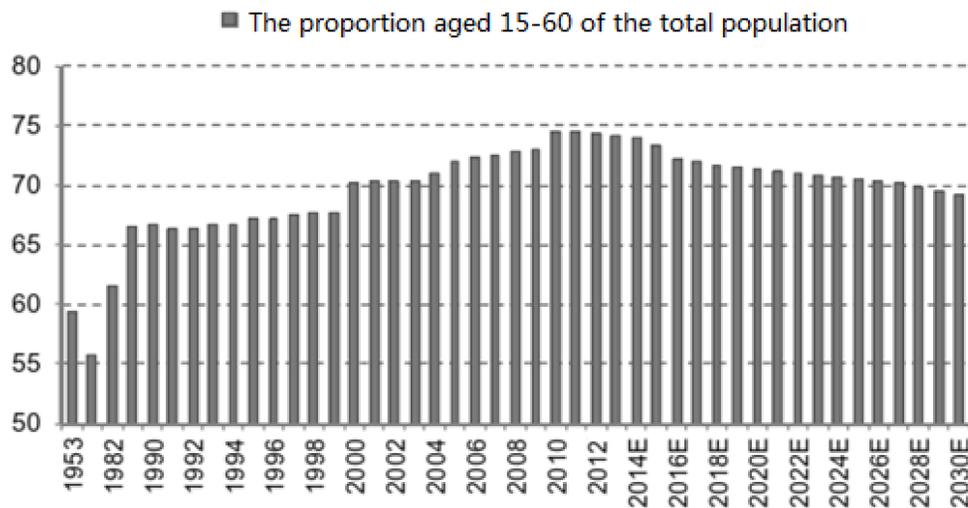
Demographic dividend is a special kind of social resources produced in specific historical stage. Especially showed as the rapid decline fertility rate in a certain period, by that time, children and the elderly dependency burdens are relatively light, and the proportion labor force of the total population rises, therefore, before the elderly population reached a high level, a relatively abundant labor resources comes out, which is very beneficial for the economic development. In essence, there are three characteristics of demographic: the first one is the periodicity. The demographic dividend is generally in a specific historical stage. With the development of economy and society, population structure model will show as a positive pyramid shape, the demographic dividend will turn into demographic debt; Secondly, the demographic dividend is a finite resource, with economic development and non-agricultural population rising, the labor from rural areas will gradually decay and deplete; Third, non-renewable. Like oil and land resources, the demographic dividend is non-renewable in a short term which is hard to regenerate^[1]. By that mean, the demographic dividend growth also cramps long-term economic development constraints. We measure the demographic dividend in two ways: the proportion of the working age population and demographic dependency ratio of the country's total population.

The presentation of China's demographic dividend turning point.

The National Bureau of Statistics released the "Statistical Bulletin" shows that at the end of 2012, China's 0-14 year old (containing less than 15 years of age) population is 222.87 million, accounting for 16.5% of the total population, the number increased by 123 million over the previous year, the proportion is basically the same as the previous year. The 15-59 years old (with less than 60 years of age) population is 937.27 million, accounting for 69.2% of the total population, which is 345 million less than the previous year, the proportion points dropped 0.60% age over the previous year, this is the first time of decline after so many years growth. Population above 60 years of age and reached 193.9 million, 14.3% of the total population, an increase of 891 million compared with the previous year, which improved 0.59% age points; Among them, 65 years of age and above population reached 127.14 million, 9.4% of the total population, increased by 427 million, or improved 0.27% points.

The World Bank expects that in 2015, working-age population in China (15-64 years) will reach a peak of 993 million and 979 million people in 2020, 979 million people in 2025, in 2020 the working-age population will fall 0.7% compared with the peak in 2015, and will increase by about 18 million

people than in 2010, this will be a very slow, gentle descent. It can be expected in the next period of time, there will no overall labor shortages^[2].



Data From : The National Bureau of Statistics, World Bank

Figure 1 : The expected proportion of labor age population in china expected to 2030

From the phenomenon above, Although China has already passed the Demographic dividend turning point and the primary demographic dividend is declining, however there is a huge potential demographic dividend still can be developed.

THE REALITY AND CHARACTERISTIC ANALYSIS OF CHINESE HUMAN RESOURCE DEVELOPMENT

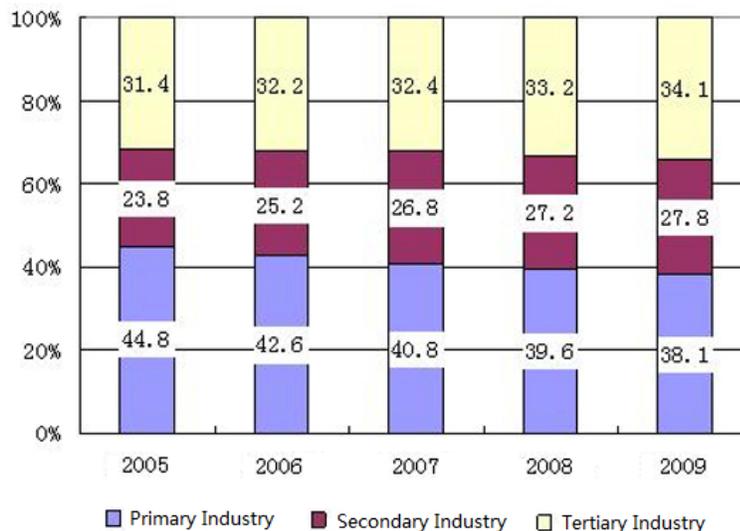
China is a developing country with large population, facing the challenges of economic globalization and huge population base. In this situation, global value chain divided into a new form of international division of labor, which requires more to the national industrial upgrading and economic development. In this context, to take advantage of global value chain division, seize the opportunity to give full play to the effectiveness of human resources and achieve industrial upgrading, the core lies in the development of human resources. Over the years, the Chinese Government has taken positive and effective policies and measures to enhance the development and utilization of human resources, China's human resource situation has significantly changed.

The abundant amount of total human resources with expanding labor.

At the end of 2009, the amount of China's labor resources is 1.06969 billion, an increase of 112.67 million than in 2000; the amount of the employed people is 779.95, of which 31,120 people employed in urban areas, respectively increased 59.1 million and 79.69 million more than in 2000. In 2010, the national amount of employment is 791.63 million, 11.68 million new jobs in cities and towns, an increase of 66 million over the previous year; the urban registered unemployment rate was 4.1%, down 0.2% age points than the previous year. In 2010 the total amount of migrant workers was 24,223 million, an increase of 5.4% over the previous year. Among them, 153.35 million are migrant workers with an increase of 5.5% while local migrant workers are 88.88 million with an increase of 5.2%. This suggests that the scale of China's labor force continues to expand, the labor reserve force is sufficient^[3].

While the total employment is increasing steadily, the employment structure continuing to improve. This mainly shows in three aspects: First of all, the secondary and tertiary industries increased year by year and the employment population of primary industry is declining. With the transfer of surplus labor to non- agricultural industries, the proportion of employment secondary and tertiary

industries continue to improve. In "Eleventh Five-Year " period, China's first industrial employment reduced to 297.08 million in 2009 from 339.7 million in 2005, an average annual reduction of 1066 million; secondary industry employment increased, from 180.84 million people in 2005 to 216.84 million in 2009, an average annual increasing of 9 million people; tertiary industry employment increased from 237.71 million in 2005 to 266.03 million in 2009, an average annual increase of 7.08 million people. Proportion of employment in the three industries from 44.8: 23.8: 31.4 in 2005 changed into 38.1:27.8: 34.1 in 2009. Primary industry average annual decline of about 1.7%, which is 0.7% higher than "tenth five-year " period; annual rise in the secondary industry is 1% age point, nearly 0.8% more than the " tenth five-year" period; the tertiary industry averagely annual increase of 0.7%. slightly lower than "Tenth Five-year" period average increase of 0.8%. Changes in the first, second and tertiary industries shows that the proportion of the employed population, China is to change the situation that the first and second industrial pattern dominated industry, the tertiary industry represented by service and high-tech industries will gradually absorb employments. The second is the rising proportion of urban employment. With the continuous progress of urbanization, the rural surplus labor keeps moving into cities and towns, therefore the proportion of urban employment also increased significantly. Total urban employment in "Eleventh Five-Year" period increased from 273.31 million in 2005 to 311.2 million in 2009, an average annual increase of 9.473 million ; total rural employment decreased by 48,494 people in 2005 to 46,875 people in 2009, with an average annual reduction of 4.048 million^[4].



Data From : Achievements report of "Eleventh Five-Year" on economic and social development Part 3

Figure 2 : Industrial employment changes during "Eleventh Five-Year" period

The Increasing total amount of human resources and continuous optimization of human resources structure

In recent years, China adhere to put the human resources first, implementing Talent strategy, keeping institutional innovation. As a result, the total amount of human resources expanded.

Professional and technical personnel

Since the reform and opening up, china's professional and technical personnel have undergone historic changes: First, the number of the professional and technical personnel continue to grow. By the end of 2008, the total number had reached 46.86 million, accounting for 6.0% of the employed. Second, the overall quality of professional and technical personnel gradually improved. In the public economic enterprises, 28.88 million are professional and technical personnel: the college educated are 22.916 million, occupied 79.3% of the total number; senior titles are 29.75 million, which is 10.3% of the total by the end of 2009. Nowadays, China has more than 1,400 academicians, more than 5200 young experts

with outstanding contributions, about 4100 the New Century National Hundred, Thousand and Ten Thousand Talent Project candidates, more than 80,000 postdoctoral researchers^[5]. Third, the role of professional and technical personnel in scientific and technological progress and economic and social development is significantly enhanced. Which have made remarkable achievements in the implementation of major scientific research projects and key projects and played an important role in promoting high-tech industries and theoretical innovation, institutional innovation, technological innovation, cultural innovation. Fourth, professional and technical personnel management system innovates continuously. Professional and technical personnel in public service system have gradually established. A market-oriented employment mechanism also initially formed, institutions hiring system and job management system basically established, initially achieved transition from identity management to position management.

Highly skilled personnel

One is that highly skilled personnel have been expanding and gradually optimize the structure. By the end of 2009, highly skilled personnel to reached 26.31 million, an increase of 7.71 million by the end of 2004, which is about 41.5%, the proportion of highly skilled workers in the skills of the total had been up to 24.7%. Secondly, the highly skilled personnel growth policy environment improved significantly. All localities and departments have formulated policies to promote the highly skilled workers, they are now in the range of special government allowances system. Third, highly skilled personnel training system gradually improved. The main role of industries in the training begins, a group of senior technical schools, colleges, vocational colleges meet the market's needs, working closely with the business have made great fundamental contributions to accelerating training personnel. Fourth, highly skilled personnel evaluation work has been strengthened. Career- oriented ability to focus on job performance, professional ethics and professional knowledge of highly skilled personnel evaluation system gradually established. Not only these, socialized identification, business evaluation, certification and other qualifications institutions also formed. Fifth, highly skilled personnel selection competition mechanism gradually improved. Various vocational skills competition activities flourished, this has become an important path for highly skilled personnel to get promoted. Sixth is the role of highly skilled personnel in the economic and social development is significantly enhanced. Titles like "chief engineer", "chief worker" began to establish the important roles of highly skilled personnel in technical research, technology and innovation.

Technology personnel

According to the second national research and testing resources inventory data, in 2009, the number of people of China's investment in research and testing activities reached 3.184 million. Among them, 179 thousand people are doctoral degree, master's degree reached 433 thousand and 945 thousand undergraduate degree^[6]. Domestic science and technology human resources are highly concentrated in the eastern coastal areas. Due to industry concentration, economically developed areas are now showing a trend of centralization of IT human resources.

ANALYSIS OF HUMAN RESOURCES DEVELOPMENT PROBLEMS IN CHINA

Low labor culture level and low and low proportion of high-level labor

The amount of human resources are huge in china and the labor force is increasing year by year, but the culture level are too low, This become an important factor that slows the process of developing. In 2009, China's average educated population (aged 15 and above) close to 8.9 years, the new labor force was 12.4 years on average, the main labor force are 9.5 years – same as a three-year junior high school level of education^[7]. In addition, the proportion of China's major labor-age population in higher education was 9.9%, the main labor force are still those who are primary and secondary educated. With too much not well educated and not enough well educated labor, China's economic development will be affected if there is no change.

Regional and town imbalances in human resources development.

Disparities between among employment regions.

Due to the low economic and social development and lack of funds, central, there is a loss of human resources in western and north-eastern regions. Data in 2013 shows that the employment population in the eastern urban regions were 72.25 million, accounting for 47.4% of the total employed population in cities and towns. Obviously, the working population is very imbalance, the eastern region has an absolute advantage while trained people in central, western and northeastern regions may choose to move to the eastern regions for jobs, this phenomenon will make the gap between regions even bigger^[8].

Huge gap of Investment in human resource development among regions

In 2008, the total financial allocation of local education funding is 1,293,173,418,000 Yuan, east China's education funding is 387,915,518,000 Yuan, accounting for 30% of the total, while North, Central, South, Northeast, Southwest and Northwest share rates were 14%, 15%, 12%, 8%, 12% and 8%^[9]. Education funding in northeast, northwest and southwest regions are in serious shortage, which changes structurally in the supply of local human resources. It is a major challenge to improve the educational level.

Unbalanced human resources development in rural and urban

Imbalances of human resource development in rural and urban has been long. Since 1949, China focuses on the development of the urban regions, especially the development of municipalities and other large cities, while rural areas were ignored. Although the issues concerning agriculture, countryside and farmers have attracted attention of the central and local government, the gap between urban and rural areas between human resource development is still insurmountable, which takes a long time to change. The Sixth census shows that there are 674 million rural people, accounting for 50.32% of the total population. Although with the accelerated pace of urbanization, China's rural population decreased year by year, due to the birth rate in rural areas is higher than the city, China's rural population will not decrease too much in a short time. The number of rural and urban population are almost the same, but because high levels of labor are more concentrated in urban areas, the majority of farmers still engaged in primary industry, while others are migrant workers. By the end of 2009, the number of farmer workers in China had reached 230 million people, of which there are 145 million migrant workers^[10]. In addition, in terms of education funding, teacher qualifications and vocational training, rural and urban have big gaps, which makes the development of human resources in rural areas is lack of necessary protections.

TABLE 1 : Chinese employment distribution

Item	National Total	Eastern Provinces		Central Provinces		Western Provinces		Northeastern Provinces	
		Absolute Figures	As Percentage of National Total	Absolute Figures	As Percentage of National Total	Absolute Figures	As Percentage of National Total	Absolute Figures	As Percentage of National Total
Population									
Population at Year-end (10 000 persons)	135404	51460.9	38.2	35926.7	26.7	36427.5	27.0	10973.4	8.1
Employment									
Number of Employed Persons in Urban Units (10 000 persons)	15236.4	7225.3	47.4	3305.3	21.7	3350.6	22.0	1355.2	8.9
Registered Unemployment Rate in Urban Area (%)	4.1	3.0		3.5		3.5		3.8	

Insufficient transformation from human resources to human capital

Human capital is a non-physical capital. It is the sum of the existence of the knowledge, skills and physical quality of the human body. The human resources in our country is very rich, but there is a

shortage of human capital transformation, which is mainly manifested in the following two aspects:(1). The shortage of investment in human capital. It is very important to increase the investment in human capital, especially education because education is the guarantee of human capital development. Nowadays, China's spending on education only accounted for 4.28% of GDP, still fall behind the world average of 4%. If we compared with the United States or other developed countries, the gap is even greater^[11]. (2). Irrational human resource supply structure. At present, China is short of high-level creative talent and lack of high level skilled personnel; with excess university graduates, staff shortages still emerges in many sectors; many highly educated labor force occupied the country's educational resources, but failed to play its proper function. Meanwhile, human resources supply structure is mainly determined by the production and reproduction of human resources. There is a very important factor affecting the production and reproduction of human resources -- education. China's vocational education class schools are now facing a shortage of funds, teachers, students and a series of difficult issues, higher education schools also facing difficulties in student employment, innovative training model and other problems. Solving these problems for optimization of human resources supply structure has important practical significance.

STRATEGIES OF HUMAN RESOURCE DEVELOPMENT DEMOGRAPHIC DIVIDEND AFTER THE INFLECTION POINT.

Education investment and reform to improve of national education level

Increasing investment in education, deepen education reform is an important guarantee for improving the national education level. It also promote the development of our human resources and social development, changing the structure of supply of human resources. The " National long-term Education Reform and Development Plan (2010-2020)", "said that in 2020, China must reach at least 90% of the gross enrollment rate of senior high school education, for higher education the rate must reach at least 40%. The number of People who are higher educated must reach 195 million. The suggestion above requires the Government to increase investment in education at all levels of education and ensure that financial education funding growth is significantly higher than the recurring revenue of financial provision growth and students' education costs in school should gradually increase. Meanwhile, improve the national financial education expenditure to GDP ratio 4%.

Building highly oriented evaluation criteria in industrial development of human resources

The progress of the human resources development is inseparable from effective monitoring and evaluation. Due to the development of human resources is a huge system, when we are making comprehensive assessment of human resource development, there may be a variety of differences in each standard, there is no mature system for the establishment of human resource development evaluation mechanisms. This evaluation mechanisms related to multiple departments. For instance, national organizations and individuals multiple levels, not only including economic benefit assessment, but also the social benefits, which includes actual contribution benefits of socio-economic development. The most important is that the effectiveness of human resource development in economy not only present as absolute increase in the number of industrial development, but even more important in the state's industrial upgrading, the overall effectiveness push a strong effect on economic development. This is even more multiple on social aspects. Human resource development in social development evaluation can be more comprehensive and objectively reflected. The human resources development is not just a specific evaluation mechanism assessment of the human resources development projects, but also the integrity of the evaluation of the overall effectiveness of human resource development: the assessment on specific projects, economic and social benefits can be evaluated to adjust the direction and implementation of specific projects; by an overall assessment of human resource development, it can be integrated to reflect the status and efficiency, laying the foundation for the system to adjust the human resource development.

Improve human resources balanced development strategy to narrow the gap between urban and rural areas

Increase investment in rural education, science and technology, keep improving the system of free education for normal college students and the quality of teachers in rural areas; improve teachers' mobility mechanism to encourage urban teachers to teach in rural schools; focusing on developing vocational education, train system skilled personnel; encourage personnel to move to rural areas in assistant of agriculture, practice the research into the efficiency of agricultural production. Encourage migrant workers to return home on entrepreneurship, encourage the development of non-farm economy, and promote the rural industrial structure upgrading. Increase the education, science and technology investment in the western region, and support the development of education in central and western regions; encourage college graduates to teach in hard remote and poor areas to improve the quality of teachers; take the necessary measures to ensure that all school-age children have chances to study at school, and eliminate dropouts; utilize the local environment and resources to transform the research results into productivity, promote economic development. Increase the health and social security, draw up preferential policies on health care and social security to raise income levels.

CONCLUSIONS

By transnational transfer of manufacturing industry, China successfully participated in the international division of labor, now has become one of the world's top manufacturing country. However, the success is based on demographic dividend brought about by specific historical conditions. Since the 21st century, China's economic growth is gradually slowing. In recent years, labor shortage and rising wages for migrant workers have resulted in a lot of trouble that low-end manufacturing enterprises are increasingly difficult to hire enough low-wage workers. In this environment, in order to achieve industrial upgrading and enhance the position in global industrial chain, we can finally rely on human resource management and optimization. Human resource optimization reflected in the quantity and quality improvement, it is the fundamental driving force to achieve economic transformation and upgrading and maintaining sustained and healthy economic development.

ACKNOWLEDGMENT

This paper is one of Huaqiao University's Academic Project Supported by the Fundamental Research Funds for the Central Universities which addressed by Zhang Xiangqian(12SKGC-QT02), China Humanities and Social Science Fund which addressed by Zhang Xiangqian(11BJY003)and The program for Fujian New Century Excellent(11FJRC04),Express thanks to the Fund support and all the participators.

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