

Explaining the Unemployment and Academic Devaluation in China from the Demand and Supply Perspective

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Abstract: This study looks at China's increasing college graduate surplus and how it affects employment and academic devaluation. China's increased investment in higher education over the last few decades has led to a sharp rise in the number of graduates, surpassing the expansion of high-tech employment prospects. There is a mismatch in the employment market since there are more graduates than the available positions that require their qualifications. This has led to an increase in college graduates' unemployment. Furthermore, the value of a college degree has decreased due to an excess of degree holders. The study examines how several factors, both macro and micro, impact on the phenomenon. These factors include individual psychological influences such as the drive to get higher credentials for declining returns, labor market conditions, and larger economic trends. This study also explores the policies implemented by the Chinese government with the goal of fulfilling market needs, including encouraging vocational education and entrepreneurship among students, which aim to address the growing concern of academic devaluation.

Keywords: unemployment, academic devaluation, higher education, supply and demand.

1. Introduction

As China embraced industrialization and globalization in the 1900s, the country is also constantly adopting or inventing more advanced technologies in many industries. To efficiently manipulate these new technologies, a higher technical skill knowledge and educational background of the workforce is generally required. In 1990, only 1.9% of the workforce had a higher education status, which became an obstacle for China in terms of modernization [1]. To improve this situation, the Communist Party of China (CPC) Council Committee and the State Government started the expansion of China's higher education since 1998, a significant step in China's higher education system [2].

Indeed, soon after the start of the expansion, the number of total enrolled college students increased to 1.6 million in 1999, marking a 47.4% increase in the enrolment rate compared to the previous year [3]. As of 2023, the higher education gross enrollment rate has reached 60.2%, with the number of total enrolled college students being more than 47 million, surpassing the targeted level [4]. The Chinese government has aimed to develop the best global vocational education system by 2035 [4]. However, as higher education enrollment increases, this has influenced China's unemployment rates in many perspectives, and to some extent, contributed to academic devaluation, which can be defined as the phenomenon where the credibility of academic qualifications is diminished.

As the number of college graduates increases yearly, many argue that this has created a surplus of college graduates [5]. While the enrollment rate continues to increase, the initial employment rate has gone the opposite way. At the beginning of the century, the initial rate was near 90%, now dropping to under 80% [5]. With more choices in the market, the employment of college graduates helps those with advanced degrees from top institutions and certain majors. Still, it also presents challenges for those with less technical degrees, such as Philosophy and Liberal Arts. This has led to an increase in the unemployment rate for college graduates from 1.15 million in 2001 to 10.76 million in 2022.

This conflict between the higher education enrollment rate and the unemployment rate in China is a pressing issue that requires analysis as it poses significant economic and social impacts. Through the past century, China's expansion in the higher education system has surely transformed the education level of the workforce, to the extent that the market supply of higher education surpasses demand, resulting in a labor market mismatch [5]. This article explores the current status of education and employment levels in China, analyzing the problem from the perspective of market supply and demand, noting other influencers, organizing current solutions, and posing a recommendation. Understanding how this issue affects China's economic stability and its education system, it is crucial to align education with labor market needs.

2. Analysis of the Workforce and Academic Devaluation

The current labor market in China presents a paradoxical situation where a surplus of highly educated graduates coexists with rising unemployment rates. This section delves into the causes and effects of this phenomenon, focusing on the market demand and supply of educational attainment, economic trends, and individual psychological influences.

2.1. Overview of Higher Education and Employment Status

China's higher education system has experienced rapid expansion over the past few decades, driven by government initiatives to increase the educational attainment of its population. This expansion, while beneficial in many ways, has also contributed to an increasingly challenging labor market for college graduates. A growing surplus of degree holders has exacerbated unemployment and under-employment rates, leading to the devaluation of academic qualifications and presenting significant challenges for both the workforce and the economy.

Between 2000 and 2020, the number of higher education institutions in China nearly doubled, and the enrollment rate for tertiary education rose from approximately 10% to over 50%. This growth has created a steady stream of graduates entering the job market each year. In 2023 alone, China produced around 11.58 million college graduates, representing a record high [3]. However, this rapid increase in the number of graduates has not been met with a corresponding rise in high-quality job opportunities, resulting in a graduate surplus. According to recent data, the unemployment rate for recent college graduates in urban areas reached nearly 20% in 2023, compared to the national urban unemployment rate of around 5.2% [5].

As the number of graduates steadily increases, until it bypasses the number of employees in 2019, this surplus has led to an oversaturation of the labor market, particularly in fields such as business, humanities, and social sciences. Graduates in these areas are facing significant difficulties in securing positions that match their qualifications and expectations. The mismatch between the number of graduates and the available job opportunities has led to widespread under-employment, where degree holders are often seen as overqualified for their jobs.

In recent years, the growth in service sector jobs is falling behind the growth in college graduates, with a significant increase in the gap in 2023 that the statistic drops below -20%. This trend shows that as more individuals enter the workforce with college degrees, the value of the degrees diminishes,

making it less of a guarantee for securing a desirable job. Employers have become more selective, often raising the standards for entry-level positions, demanding higher qualifications, and even graduate degrees for roles that previously required only a bachelor's degree. This phenomenon has contributed to an increase in precarious employment and lower wages for recent graduates.

2.2. Market Demand and Supply of Workforce's Education Attainment

The rapid expansion of China's higher education system over the past two decades has resulted in a surplus of college graduates. According to recent statistics, around 10.76 million students graduated from higher education institutions in 2022, representing a sharp increase from the approximately 1 million graduates in 1999 [2]. While this expansion was intended to fuel China's transition from a manufacturing-based economy to a knowledge-driven one, the labor market has not kept pace with the influx of degree holders.

Despite the government's initiatives to boost high-skill sectors such as technology and finance, demand for college graduates remains insufficient. A significant proportion of these graduates are now entering industries with low-skill requirements or are forced to take on jobs unrelated to their field of study. Research indicates that 40% of Chinese college graduates are either unemployed or underemployed, often working in roles that do not require a college degree [6]. This discrepancy between supply and demand has contributed to an oversaturated labor market and has led to the devaluation of higher education credentials.

Employers, overwhelmed by the number of degree holders, are raising job requirements, often asking for advanced degrees or years of experience for entry-level positions. This has created a paradox where individuals with college degrees are competing for positions traditionally filled by those with lower educational qualifications, thus pushing non-degree holders further down the employment ladder.

2.3. Economic Trends

Economic trends have exacerbated the devaluation of higher education in China. The nation's shift from a manufacturing-centered economy to one focused on services and technology has not happened uniformly across all regions and industries. While metropolitan centers such as Beijing, Shanghai, and Shenzhen have seen growth in multi-skilled job sectors, many rural and less developed areas continue to rely on less complicated industries. The result is a geographical mismatch, where graduates are concentrated in cities that cannot absorb them all, while less developed regions face a shortage of high-skilled workers.

Moreover, the slowing global economy and COVID-19-related disruptions have worsened the employment prospects for recent graduates. China's economic growth slowed to 3% in 2022, a sharp decline from the pre-pandemic growth rates of 6% to 7% [7]. This slowdown, coupled with international trade tensions, has reduced the demand for new hires, particularly in industries with intricate technologies. Job creation in sectors like technology and finance has not matched the number of graduates entering the workforce annually.

Another factor is the competition with automation and artificial intelligence, which has reduced the need for human labor in many sectors. A study from the World Economic Forum estimated that by 2025, over 85 million jobs could be displaced globally due to automation, with significant impacts on China's workforce [7]. As such, the demand for labor in certain sectors has shrunk, leading to more competition among graduates and the subsequent devaluation of their qualifications.

2.4. Individual Psychological Influences

The academic devaluation is also having profound psychological effects on individuals. Graduates entering the workforce with high expectations of well-paid, stable jobs are often faced with disillusion and frustration when they are unable to secure such positions. The mismatch between qualifications and job opportunities has led to what some scholars call the “graduate employment paradox,” where individuals feel overqualified for available roles but are unable to access positions that match their education [8].

This has led to a growing trend of “involution,” where graduates, in a highly competitive job market, engage in seemingly futile cycles of self-improvement (such as acquiring additional degrees or certifications) in the hope of standing out among their peers. However, as more individuals pursue higher qualifications, the overall value of these qualifications diminishes, creating a vicious cycle. The result is a rise in anxiety, depression, and feelings of worthlessness among recent graduates [9].

Furthermore, the pressure to meet societal and familial expectations exacerbates these psychological stresses. In China, there is a deep-rooted cultural emphasis on education as a pathway to social mobility and financial liberty. The inability to secure a well-paying job despite having a degree can lead to feelings of failure and shame, especially for those who come from low-income backgrounds and have invested heavily in their education.

2.5. Other Impact

In addition to market and psychological factors, other external influences contribute to the devaluation of education attainment of labor in China. Government policies, for instance, have played a role in shaping the current employment landscape. While China has made efforts to diversify its economy and promote technological industries, certain policies have inadvertently hindered job creation in these sectors. For example, restrictive regulations on startups and small businesses have limited the growth of industries that could potentially absorb a large number of graduates.

Moreover, the rapid expansion of higher education has not been matched by improvements in the quality of education provided. While the number of universities and colleges has increased, many of these institutions offer subpar programs that do not adequately prepare students for the demands of the modern workforce. A study showed that more than half of Chinese graduates feel that their education did not equip them with the practical skills needed for their jobs [10]. This lack of preparedness contributes to the devaluation of their degrees in the eyes of employers.

Additionally, the global trend of degree inflation, where higher education qualifications are increasingly required for jobs that historically did not necessitate them, has influenced China as well. As employers raise educational requirements to manage the oversupply of degree holders, individuals without higher education credentials are pushed into even lower-paid and less secure jobs.

3. Policy Evaluation

In response to the unemployment and academic surplus issues, the Chinese government has implemented several policies aimed at alleviating the graduate employment crisis. China’s policies aimed at addressing the graduate employment crisis have achieved some success but have not fully resolved the issue.

3.1. Current Policies

One of the most prominent policy moves is the push for vocational education. The government has been encouraging high school students to pursue vocational training to better align their skills with labor market demands. Vocational graduates tend to have better employability in specific industries

like manufacturing, construction, and services, which are vital to China's economy. As of 2022, vocational college students account for 42.3% of all college students in China [11]. However, the effectiveness of these policies is debatable. Vocational education programs, though useful, are often seen as inferior to university education, leading to lower enrollment rates. A 2024 study shows that less than 30% of Chinese students choose vocational training over university education [10].

Another key initiative is the promotion of entrepreneurial activities among graduates. In recent years, the government has launched various entrepreneurship programs, offering financial support and training to encourage graduates to create their own businesses. This has partially mitigated the job scarcity, though its impact remains limited due to the challenges associated with starting and sustaining businesses. Moreover, the push for entrepreneurship has faced challenges, with many graduates lacking the skills or support necessary to successfully start businesses. Data shows that only around 8% of graduates pursue entrepreneurial ventures, and of these, nearly 50% fail within the first two years [5].

3.2. Recommendations

While the above policies have made strides, more comprehensive measures are necessary to address the full scope of the problem. The following recommendations are aimed at better aligning the higher education system with the needs of the labor market.

One improvement could be to strengthen collaboration between universities and employers, since a significant gap is the disconnection between higher education institutions and the labor market. Strengthening collaboration through internships, apprenticeships, and joint training programs can better equip students with practical skills. Data suggests that graduates with hands-on experience have a higher chance of employment, especially in industries such as technology and engineering [6].

Similarly, given the oversupply of graduates, refining enrollment policies to balance student intake between academic and vocational tracks can prevent future surpluses. Through predictions of the future economy and employment needs, educational departments and colleges can possibly adjust their student intake accordingly.

4. Conclusion

The article explores the complexities of China's labor market as it grapples with the increasing surplus of college graduates, contributing to academic devaluation. By analyzing labor market trends, the article demonstrates that while higher education expansion has provided more opportunities for students, it has also led to an oversupply of graduates relative to the demand for highly skilled labor. This mismatch between the workforce's educational levels and market demand results in unemployment and under-employment among graduates, as well as the devaluation of academic credentials. The article further delves into economic trends, market forces, and individual psychological impacts contributing to these issues, offering policy recommendations such as strengthening vocational training, enhancing industry-academic partnerships, and promoting more targeted educational reforms to better align graduates' skills with labor market needs.

However, this paper has limitations in its scope and data. It primarily focuses on general trends and aggregate data, potentially overlooking variations across different regions and industries within China. Additionally, the analysis does not fully account for the role of government intervention or international comparisons. Future research could benefit from a more nuanced examination of these variables, exploring how specific policies in different regions impact the employability of graduates and the evolving requirements of global labor markets. A more comprehensive longitudinal study would help in understanding the long-term effects of higher education expansion and the success of various interventions in curbing unemployment and devaluation.

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