

# ***An Analysis of Educational Equity Issues from the Perspective of College Entrance Examinations in Beijing and Shandong***

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**Abstract:** Educational equity, as a crucial cornerstone of social equity, reflects evolving value pursuits across different times and contexts. In China, the pursuit of educational equity has been a consistent priority. And in the new era, greater emphasis is placed on high-quality educational equity to meet the growing demands of society. Taking the college entrance examination systems in Beijing and Shandong as case studies, there are significant educational equity issues in the college admission processes of the two regions. The admission data reveals that the undergraduate admission rate in Beijing is substantially higher than that in Shandong. This disparity is driven by several factors: in terms of population, the number of candidates in Shandong is approximately 15 times that of Beijing, resulting in extremely fierce competition; in terms of educational resources, Beijing enjoys a clear advantage in the number and quality of universities, as well as more competitive teaching staff in primary and secondary schools; and in terms of college entrance examination policies, the admission scores in Beijing are relatively low and some universities tend to enroll more local students. To address these problems, efforts should focus on increasing investment in educational resources, optimizing the construction of teaching staff, and refining college entrance examination policies. Such measures are essential for advancing educational equity, fostering balanced development of education, and cultivating a larger pool of outstanding talents for the nation.

**Keywords:** Educational Equity, College Entrance Examination, Case Study

## **1. Introduction**

Educational equity, as the key cornerstone of social fairness, has distinct characteristics across different times and contexts and remains a core value in the development of education worldwide. Since the founding of the People's Republic of China, the government has prioritized education equity through policies such as the nine-year compulsory education system, ensuring citizens' right to education. In the new era, as educational resources grow, challenges persist, particularly regarding the unbalanced distribution between urban and rural areas and across regions. The focus has shifted from equal access to educational opportunities to equitable outcomes, especially in the college entrance examinations.

The disparity in undergraduate admission rates between Beijing and Shandong Province exemplifies this issue. Data from 2020 to 2024 reveal significantly higher admission rates in Beijing (64.6%-75.2%) compared to Shandong (32.7%-37.2%), despite Shandong having a much higher candidate pool. This study uses data analysis and comparative methods to deeply analyze the impact of factors such as population size, differences in educational resources, and differences in college entrance examination policies. This study is of great significance for promoting educational equity. At the theoretical level, it is helpful to deepen the cognition of the connotation and influence mechanism of educational equity and provide an empirical basis for subsequent research. At the practical level, it can provide the direction for the optimization of education policies, the rational allocation of resources and the reform of the college entrance examination system; promote the balanced development of education; ensure that every student can enjoy fair and quality education opportunities; and then cultivate more outstanding talents for the country and help the process of building an education power.

## **2. The Connotation of Educational Equity**

Educational equity serves as the cornerstone of social fairness and represents the high standard of justice in education. It has been a long-standing pursuit in human societies, evolving with economic, social, and cultural progress. This concept exhibits distinct characteristics across different times and spaces, shaped by the unique economic, cultural, and societal conditions of various eras, nations, and regions [1].

The idea of educational equity can be traced back to ancient civilizations. In ancient Greece, Plato was the first to put forward the concept of educational equity as a means to cultivate capable citizens, while Aristotle emphasized the need to safeguard the educational rights of free citizens through laws. In China, Confucius championed the principle of "education for all without discrimination," reflecting an early vision of equal access to learning opportunities. These foundational ideas laid the groundwork for educational equity as a universal value.

Since the founding of the People's Republic of China, the Party and the government have always attached great importance to educational equity and implemented a series of policies to ensure educational equity. Efforts have included the implementation of the nine-year compulsory education system, which ensures that every school-age child can access basic education, irrespective of geographic or economic conditions. In the new era, in the promotion strategy of educational equity in China, optimizing the allocation of educational resources to achieve the balanced development of public education is a key link.

## **3. Examining Educational Equity through College Entrance Examination Disparities: A Comparative Study of Beijing and Shandong**

In the current context of China's social and economic development, the total amount of educational resources has been constantly expanding. However, there is still a certain degree of imbalance in the distribution between urban and rural areas and regions [2]. The connotation of educational equity includes equity at the starting point, in the process, and in the result. At present, education in China has solved the problem of whether there is access to education. The educational equity in the new era is mainly to solve the problem that everyone can receive a good education. What we are facing is not the issue of whether there is equity but the issue of the quality of equity. Only high-quality educational equity can truly meet the growing needs of the people for a better life [3].

The issue of disparities in educational outcomes is particularly evident in the college admission process. There are great differences in the difficulty of college admission among different regions. There are many reasons for this phenomenon. Using Beijing and Shandong as examples, this chapter

examines the educational equity issues between the two regions through the lenses of educational resource allocation, examination policies, and admission outcomes.

The existence of educational equity issues in the college admission processes in Beijing and Shandong can be seen from the college admission data of the two regions. The following is a selection of the admission data of the two regions from 2020 to 2024, as shown in Table 1.

Table 1: College Admission Data of Beijing and Shandong in 2020-2024

Year	Shandong					Beijing				
	2020	2021	2022	2023	2024	2020	2021	2022	2023	2024
Number of College Entrance Examination Candidates (10,000)	76.9	79.5	86.7	98	99.8	4.92	5.1	5.4	6.5	6.72
Number of Undergraduate Admissions (10,000)	28.6	29.4	31.2	32	32.9	3.7	3.6	3.7	4.2	4.5
Undergraduate Admission Rate (%)	37.2	37	36	32.7	33	75.2	70.6	68.5	64.6	66.9

Data source: China Education Online, Lightning News, Beijing Youth Network, China Youth Daily, Senior High School Network

It can be seen from Table 1 that in recent years, Beijing consistently achieves a significantly higher undergraduate admission rate than Shandong. This means that students in Beijing have more opportunities to receive undergraduate higher education than those in Shandong. Obviously, this does not conform to the result equity principle in educational equity. Specifically, candidates in Shandong have greater difficulty in being admitted to undergraduate schools compared to their counterparts in Beijing.

The reasons for this disparity are as follows. First, it is the population gap between Beijing and Shandong, which directly affects the number of candidates participating in the college entrance examination every year. The more people they are, the fiercer the competition in the college entrance examination. Almost every year, the number of candidates in Shandong is about 15 times that of Beijing. The huge difference in the number of people leads to the fact that the intensity of competition in the college entrance examination in Shandong is far greater than that in Beijing. In the college entrance examination in Shandong, there is a saying that "increasing one point can surpass a thousand people," which reflects that in the same score range, there are many students, and the competition is very fierce.

Second, a stark gap exists in the availability and quality of educational resources between Beijing and Shandong, as shown in Table 2:

Table 2: Comparison of Universities in Beijing and Shandong

Region	Number of Undergraduate Universities	Number of 985 Universities	Number of 211 Universities
Beijing	92	8	26
Shandong	70	2	3

Data source: China Education Online, Lightning News, Beijing Youth Network, China Youth Daily, Senior High School Network

It can be seen from Table 2 that whether in the number of undergraduate universities or in the level of university running, Beijing far exceeds Shandong. As the second most populous province in China

and a major province for the college entrance examination, the resources of universities in Shandong cannot match the demand for further education in the province, which undoubtedly increases the difficulty of admission for local candidates in the province. As far as Shandong Province is concerned, the insufficient number of universities is also not conducive to the rational allocation of educational resources.

In addition to the gap in higher education resources, there is also a large gap in primary and secondary education resources between the two regions. As the capital of China, Beijing is more attractive to highly educated and high-quality teachers, while in some rural areas and underdeveloped counties in Shandong, there is a shortage of teachers and the quality of teachers is not high. This makes a large difference in the quality of education received by students in the two regions during the education process. This difference will not only affect the difficulty for students to enter universities but also have a profound impact on the development of students after entering universities.

Third, there are also certain differences in the college entrance examination policies between the two regions. On the one hand, the admission scores for the college entrance examination in Beijing are relatively low. Taking the 2024 college entrance examination as an example, the general undergraduate admission control score line in Beijing is 434 points, while that in Shandong is 444 points. This means that two candidates with the same score may have different admission results due to regional differences, which is obviously contrary to the educational equity principle. On the other hand, the enrollment numbers of various universities in the two regions are different. For example, the planned enrollment number of Peking University in Shandong in 2024 is 66, while that in Beijing is 188. The number of candidates in Shandong far exceeds that in Beijing, but the planned enrollment number of Peking University in Shandong is less than that in Beijing. It is not difficult to see that the university's enrollment policy is inclined towards the Beijing region, and this inclination aggravates the problems existing in educational equity. People's pursuit of educational equity is a continuously escalating process. In the early stage, more attention was paid to the equity of admission opportunities, that is, everyone has the right to go to school, and the admission opportunities for all types of education are equal for everyone. However, due to the different family backgrounds and educational experiences of each individual, the equality of admission opportunities cannot guarantee the equality of actual educational opportunities for various groups of people, cannot guarantee the equality of the education process, and even less can guarantee the equality of opportunities for academic success. With the process of social democratization and the development of education, people are increasingly paying attention to the equality of educational results [4].

## **4. Coping Strategies**

Facing the problems existing in educational equity, active measures should be taken to deal with them.

### **4.1. Balancing Educational Resource Allocation**

First, increasing investment in educational resources and ensuring a more balanced distribution of educational resources is critical. Especially for rural areas and small cities in Shandong, it is necessary to allocate additional educational funding, improve educational facilities, and establish robust coordination mechanisms among provincial, municipal, and county governments. This includes optimizing the layout of urban and rural schools, expanding the capacity of urban schools, and supporting the development of small-scale rural schools. Strengthening the construction of boarding schools and improving the guarantee mechanisms for preschool education and special education are also necessary steps. These efforts aim to build a high-quality, balanced public education service system that ensures equitable access to foundational educational opportunities [5].

## 4.2. Enhancing Teacher Quality and Distribution

At the same time, improve the welfare and treatment of teachers to attract excellent teachers to teach in these areas. Strengthening the construction of the teaching staff and improving the quality of teachers. The investment in teacher training can be increased to improve the professional quality and teaching level of teachers and encourage teachers to update educational concepts and methods. Additionally, establishing a teacher mobility mechanism to promote the reasonable flow of teachers among different regions and schools and encourage excellent teachers to teach in rural areas and educationally weak areas to improve the education quality in these areas.

## 4.3. Reforming College Entrance Examination Policies

Ensuring fairness in college entrance examination policies is vital. It is understandable that there are differences in college entrance examination policies among regions, but efforts should be made to continuously narrow and avoid admission differences caused by different college entrance examination policies. Policies should be refined to better reflect equity principles while maintaining regional characteristics. For special types of admissions, such as independent admissions and comprehensive quality admissions, supervision should be strengthened to prevent rent-seeking of power and unfair competition.

## 5. Conclusion

The college entrance examination situations in Beijing and Shandong reflect to a certain extent that China still faces some challenges in educational equity. However, this does not prevent the college entrance examination from being a fair examination for everyone. What we need to do is to face up to the unfavorable factors affecting educational equity, such as the uneven distribution of educational resources and differences in college entrance examination policies, and work together to continuously promote educational equity and provide fair and high-quality educational opportunities for every student. Only in this way can the balanced development of the education cause be realized and more outstanding talents be cultivated for the country.

This paper only selects the college entrance examination admission data of Beijing and Shandong from 2020 to 2024, which has a short time span and narrow geographical scope and is difficult to fully reflect the overall situation and long-term trend of educational equity in college entrance examination enrollment in China. The representativeness of the data may be affected by special policies or accidental factors in the past few years, which cannot cover the differences in different stages of economic development and education reform. Although it is pointed out that population, educational resources and college entrance examination policies are the reasons for the differences between the two places, statistical analysis and other methods have not been used to quantify the impact of each factor on the admission results, and the interaction between each factor has not been deeply discussed, making the conclusion relatively qualitative and general. Extend the data time span to 10 years or even longer, and add more representative regional data for comparative analysis, such as the combination of developed eastern regions and central and western regions, and large and small population provinces. Using statistical methods such as multiple linear regression, the population size, various educational resource indicators, and college entrance examination policy variables were included in the model to accurately analyze the influence weights and mutual relationships of each factor on the undergraduate admission rate, so as to enhance the scientific and convincing nature of the research conclusions.

## References

- [1] Jin Yongren & David. (2024). *The Value Orientation and Possible Paths of Promoting Educational Equity in the Process of Building a Powerful Education Country*. *Lifelong Education Research* (06), 21 - 28. doi:10.13425/j.cnki.jjou.2024.06.003.
- [2] Ma Guoliang. (2023). *The Promotion Strategy of China's National Strategy of Educational Equity in the New Era*. *Social Scientist* (11), 150 - 154.
- [3] Cheng Tianjun. (2024). *High - Quality Educational Equity - An Introduction to the National Strategy of Educational Equity in the New Era*. *Educational Research* (04), 4 - 16.
- [4] Yu Xiulan. (2023). *Educational Equity in the Context of Chinese-Style Modernization*. *Jiangsu Higher Education* (09), 29 - 37. doi:10.13236/j.cnki.jshe.2023.09.004.
- [5] Liu Zicheng. (2024). *Deepening the Comprehensive Reform of Education Centered on Promoting Educational Equity*. *Labor Economic Research* (05), 9 - 12.