

Research on the Balanced Development of Urban and Rural Compulsory Education Through Education Resource Allocation

Kaijie Shang*

Cheongju University, Cheongju 28497, Republic of Korea

*Corresponding author: Kaijie Shang, 752386459@qq.com

Copyright: © 2024 Author(s). This is an open-access article distributed under the terms of the Creative Commons Attribution License (CC BY 4.0), permitting distribution and reproduction in any medium, provided the original work is cited.

Abstract: With the rapid development of our country's economy, education has gradually become the focus of social attention. The problem of unbalanced distribution of urban and rural educational resources has become increasingly prominent, urban educational resources are relatively rich, while rural educational resources are relatively scarce, and the balanced development of urban and rural compulsory education has become an urgent task. This paper mainly investigates and studies the distribution of urban and rural educational resources, discusses the unbalanced distribution of urban and rural educational resources and analyzes the reasons, and puts forward a series of corresponding solutions to promote the balanced development of urban and rural compulsory education.

Keywords: Urban and rural educational resources; Balanced development; Educational resource allocation

Online publication: July 30, 2024

1. Introduction

Education is the basis of personnel training and social development and is the key to national prosperity and all-round development. However, the unbalanced distribution of educational resources in urban and rural areas has become one of the important factors restricting the development of education in our country. In the city, education resources are abundant, school conditions are good, teachers are strong, and students can have access to advanced teaching equipment and resources; in rural areas, because of the lack of educational resources due to capital investment, teacher allocation, and other factors, students' learning environment and conditions are relatively poor. This unbalanced distribution of educational resources in urban and rural areas not only affects the educational opportunities and quality of students in rural areas but also intensifies the educational gap between urban and rural areas.

2. Analysis of the current situation of urban and rural educational resources

2.1. Uneven distribution of education funds

In view of the significant differences between urban and rural economic development and tax contributions, urban investment in education is generally significantly ahead of rural investment. This difference directly affects the distribution pattern of educational resources, making urban schools show significant advantages in hardware facilities, teaching staff, and teaching resources. In contrast, rural schools generally face the dilemma of a shortage of funds, which limits the improvement of education quality and the release of development potential. Urban schools benefit from abundant educational funds to purchase advanced teaching equipment and resources to provide students with a more comfortable learning environment ^[1]. Urban schools also enjoy rich and diverse teaching resources, including books, multimedia teaching materials, and extensive opportunities for cooperation and exchange with other schools and educational institutions. In rural schools, the problem of insufficient funds is not uncommon. This not only limits their investment in hardware facilities, leading to relatively backward teaching conditions but also affects their ability to attract and retain excellent teachers, making it difficult to effectively improve the overall quality of teachers. Rural schools also face many challenges in the acquisition of teaching resources, which undoubtedly restricts the improvement of their education quality and the overall development of students. The total funding for preschool education in 2020 will reach 420.463 billion yuan, an increase of 179.58% over 2012 (150.393 billion yuan); half of the money went to rural areas ^[2].

2.2. Uneven conditions of educational facilities

The imbalance in educational facilities is an important manifestation of the gap between urban and rural educational resources. Urban schools usually have more modern and high-quality teaching facilities, including but not limited to laboratories, libraries, multimedia classrooms, sports venues, art rooms, etc. The modernization and comprehensiveness of these facilities provide teachers with more teaching tools and resources, create a better learning environment for students, and improve the quality of teaching and learning results. In contrast, rural schools have relatively poor teaching conditions. Schools in rural areas lack modern professional facilities, such as outdated laboratory equipment, limited library collection resources, and aging multimedia classroom equipment. This lack of professional facilities directly affects the teaching quality of rural schools and students' learning experience. Due to the lack of modern laboratory equipment, rural schools cannot provide students with rich and diverse practical teaching experience, which affects the cultivation of students' scientific experimental skills and practical skills ^[3]. The library resources of rural schools are limited, and students lack reading opportunities and resources, which makes it difficult to expand their knowledge and improve their reading skills. Multimedia classroom plays an important role in modern teaching, which can display rich teaching content through multimedia and stimulate students' learning interest. However, the multimedia classroom equipment in rural schools is often old and cannot meet modern teaching needs. Although the current conditions of rural compulsory education have improved significantly, the overall gap between urban and rural areas is still large. In 2020, the average teaching equipment value of rural primary school students is 1,652 yuan, an increase of 93.67% over 2015, which is 20.39 percentage points higher than the national average; the average teaching equipment value of rural junior middle school students is 2,541 yuan, an increase of 67.72% over 2015, slightly higher than the national average increase. In 2020, there will be 11.9 teaching computers for every 100 primary school students in rural areas, an increase of 54.66% over 2015 and significantly higher than the national average (38.82%). In 2020, there will be 16.3 teaching computers for every 100 junior high school students and 15.6 for rural junior high schools, an increase of 31.09% over 2015 and higher than the national average (28.35%) ^[4].

2.3. Uneven teaching staff structure

In cities, the relatively high salary level, convenient life and career development space, and other factors attract more excellent teachers with high education, professional quality, and teaching experience to teach in urban schools. These excellent teachers have rich experience and professional knowledge in education and teaching and are able to provide students with quality teaching services and improve their learning enthusiasm and academic achievement. Rural areas face a shortage of teachers and mobility. Due to the relatively backward infrastructure conditions and living environment in rural areas, it is less attractive for teachers to work and live in rural areas. The structure of teachers in rural areas is generally unreasonable, the overall quality of teachers is low, and the teaching level is uneven, which directly affects the teaching quality and teaching effect of rural schools. The lack of excellent teachers in rural areas will bring a series of problems to students' learning and development. For example, the lack of excellent teachers in rural schools will lead to a decline in the quality of education and teaching, and students' learning interests and achievements may be affected. Excellent teachers can better pay attention to students' personality characteristics and development needs, while the lack of excellent teachers makes it difficult to provide personalized education services for students. In 2021, the average teacher-to-class ratio in primary schools will be 2.02:1. Among them, the urban area is 2.04:1, the town area is 2.11:1, and the rural area is only 1.88:1. The allocation of full-time teachers in rural primary schools is insufficient. The national average teacher-to-class ratio is 3.83:1. Among them, the urban area is 3.60:1, the town area is 3.83:1, and the rural area is 4.52:1. According to a survey of 21,278 teachers in 31 provinces across the country in 2020, young teachers under the age of 29 account for 22.2% of the entire teaching team in rural areas, 21.3% in towns, and 16.1% in urban areas, 6.1 percentage points higher in rural areas, showing a trend of youth. However, the aging problem of rural teachers is still serious, the proportion of teachers over 55 years old is 8.8% in rural areas, 4.5% in towns, and 3.3% in urban areas, 5.5 percentage points higher in rural areas^[5].

2.4. Uneven development and implementation of educational policies

Due to the differences in development problems and needs between urban and rural areas, the formulation and implementation of educational policies are often difficult to fully meet the actual needs of the two places, resulting in the unbalanced distribution of educational resources between urban and rural areas. In terms of policy support, urban schools often enjoy more preferential policies and support. Urban schools also have easier access to policy support and training resources and generally have a higher level of professionalism in the teaching force. These policy supports provide urban schools with broader development space and better education conditions and improve the quality and competitiveness of urban schools. Schools in rural areas lack corresponding policy support and guarantees. Due to the relative lack of infrastructure and low level of economic development in rural areas, the government's investment in the field of education is relatively insufficient, which leads to the shortage of resources in rural schools, the imbalance of the structure of the teaching staff, and the backward teaching conditions.

3. Analysis of the causes of unbalanced distribution of urban and rural educational resources

3.1. Insufficient capital investment

Due to the high population density and economic vitality of urban areas, governments usually tend to increase investment in urban education. This biased investment distribution model inevitably leads to the relative lack of educational resources in rural areas. Due to their unique geographical and economic advantages, cities are usually able to attract more government investment. These funds are mainly used to improve the education

hardware facilities, improve the teaching management system strengthen the construction of teachers, and further improve the quality and level of urban education. Compared with urban areas, the situation in rural areas is quite different. Because of their remote location and weak economic base, rural areas often do not receive the same level of government support as urban areas. This leads to the relative shortage of educational resources in rural areas, and further aggravates the unbalanced distribution of educational resources in urban and rural areas.

3.2. Insufficient distribution of urban resources to rural areas

The government's investment in rural education resources is insufficient. Although the government proposed increasing investment in rural education, the actual implementation has encountered issues with uneven distribution of funds. Most of the educational resources are still concentrated in urban areas, and the educational conditions of rural schools cannot be effectively improved. The government should increase the investment in rural education resources to ensure that the resources are redirected to the countryside. The government has not clearly defined the goal and specific measures of the balanced distribution of urban and rural educational resources in the education policy, resulting in the advantages of urban resources cannot be effectively redirected to the countryside. The government should formulate clear targets for the balanced distribution of urban and rural educational resources, clarify the direction of resource distribution, and ensure the reasonable distribution of resources. Since the quality of education in urban areas has always been higher, the government tends to increase the investment in urban education resources, while ignoring the educational needs of rural areas. The government should adjust the policy focus, redirect more resources to rural areas, and improve the development level of rural education.

3.3. Differences in social and cultural concepts

In the in-depth study of the distribution of educational resources, we have to face a remarkable phenomenon, that is, the urban and rural families in the level of education investment and concept presented a significant difference. Generally, urban parents hold a more positive attitude towards education investment, generally attach more importance to education, and are willing to provide high-quality educational resources for their children. This positive attitude has undoubtedly created a richer and more comprehensive learning environment for urban children. In contrast, the education concept of rural families is relatively backward. Due to the lack of attention, rural families often struggle with education investment, which limits the opportunity for rural children to receive quality education to a certain extent. This significant difference in education concepts and investment between urban and rural areas eventually leads to the unbalanced distribution of educational resources between urban and rural areas.

3.4. Brain drain of educational resources

Due to the relatively underdeveloped economy in rural areas, the low salary of teachers, and the more abundant teacher resources in cities, more talents are lost in educational resources, resulting in the shortage of educational teachers in rural areas, and further increasing the gap between urban and rural educational resources. On the one hand, urban teachers enjoy relatively higher salaries, greater career development opportunities, and better welfare benefits, attracting a large number of high-quality educational talents to work in the city. On the other hand, teachers in rural areas receive relatively poor treatment, and the educational resources and teaching environment are not as good as those in cities, leading to some rural teachers choosing to move to cities to seek better career development and living conditions. Teachers in rural areas face the pressure of staff loss all year round, which leads to the shortage of teachers in rural schools and makes it difficult to guarantee teaching quality.

4. Countermeasures and suggestions for the balanced development of urban and rural educational resources

4.1. Increasing investment in rural education

To increase investment in rural education, comprehensive consideration should be given to the funding needs of the school building, teaching equipment renewal, teacher training, and other aspects in order to improve the teaching conditions and education quality of rural schools. The government may set up special funds to improve the construction of school buildings in rural schools, including repairing old school buildings and building new teaching buildings and dormitories, ensuring that students have a safe and comfortable learning environment to enhance the overall image and functionality of the school. It is also necessary to provide rural schools with modern teaching equipment and teaching resources, such as multimedia classrooms, computer equipment, library resources, etc. These devices can improve the teaching effect, stimulate students' interest in learning, and promote the improvement of education quality. More efforts will be made to train rural teachers to improve their teaching level and professional quality. Activities such as further study, professional training, and teaching method training can be organized to improve teachers' teaching skills and innovative spirit, so as to provide better education services for rural students. The allocation and distribution of educational resources are optimized to ensure the rational use and distribution of educational resources in rural schools. According to the actual needs of schools, targeted allocation of educational resources can improve the overall teaching level and efficiency. The government should ensure that investment in rural education is sustained and stable, rather than a one-off short-term measure. Only by continuously increasing investment can we achieve the long-term goal of education development, improve the quality of education in rural schools, narrow the gap between urban and rural education resources, and promote the fair and balanced development of education.

4.2. Improving the construction of teacher teams

The government should increase the salary security and welfare benefits for rural teachers, ensure that they have a stable source of income, and improve their work enthusiasm and professional development motivation. We can encourage teachers to stay in rural schools for a long time by rewarding excellent teachers, increasing subsidies for rural teachers, and establishing a sound insurance and welfare system. Rural teachers can be provided with systematic training and further education opportunities to improve their teaching level and professional quality. Various activities such as technical training, teaching method training, and professional learning can be organized to help rural teachers constantly improve their capabilities and meet the needs of education reform and development. We will set up a reward mechanism to attract more excellent teachers to teach in rural schools. Outstanding teachers engaged in rural education can be rewarded with honorary titles, bonuses, training opportunities, etc., to encourage them to play a role in rural areas and improve the teaching quality and influence of rural schools. A sound management mechanism is established for teachers to ensure the stability and quality of teachers. A perfect system of teacher recruitment, evaluation, assessment, and promotion can be formulated to standardize the management of teachers, encourage their sustainable development, retain talents, and improve the overall quality of teachers. We also need to explore the establishment of flexible and diverse teacher training models, and encourage rural teachers to participate in online education, remote training, and other forms of education and training activities. Modern technology and innovative teaching methods are used to improve teachers' professional ability and teaching level.

4.3. Establishing a sound evaluation and supervision mechanism

We will establish indicators and standards for evaluating the balanced development of urban and rural educational resources, including indicators on the number of schools, conditions of school buildings, teachers,

teaching equipment, and teaching quality, so as to ensure the objectivity and scientific nature of the assessment. At the same time, according to the actual situation and needs of different regions, the evaluation indicators and criteria are flexibly adjusted to adapt to the characteristics of urban and rural differences. A regular evaluation and supervision mechanism is established for the balanced development of urban and rural educational resources, and evaluate and supervise the distribution and development of urban and rural educational resources every year. The evaluation results should be made public and subject to public supervision, so as to encourage the government to improve education policies and resource allocation in a timely manner and ensure the rational allocation and use of resources. The data statistics and information system of urban and rural educational resources should be established to monitor and analyze the distribution, use, and benefits of educational resources in real time. Through data analysis, problems such as unbalanced distribution and resource waste of urban and rural education resources are found in time, providing a scientific basis for policy formulation and resource allocation. A complaint and reporting mechanism is established for the balanced development of urban and rural educational resources and lets the public participate in the supervision and evaluation of urban and rural educational resources. Any violations and inequities shall be accepted and investigated promptly to protect the legitimate rights and interests of the damaged groups and maintain the fair distribution and use of educational resources. A professional team of evaluation institutions and supervision departments is established for the balanced development of urban and rural educational resources to improve their evaluation and supervision capabilities. Additionally, it is important to carry out training and exchange activities, strengthen the learning of professional knowledge and skills, and ensure the scientific and accurate assessment and supervision work.

4.4. Promoting the construction of education informatization

Promoting the construction of education informatization in rural areas is an important measure to improve the quality of education and promote the balanced development of educational resources. By means of information technology, rural teachers will be provided with online education and remote training opportunities to improve their teaching level and professional quality. An information-based training platform is established for teachers to promote high-quality teaching resources, share teaching experiences, and improve their information-based application ability and teaching quality. The digital teaching resource library of rural schools, including teaching videos, electronic textbooks, network classes, etc., has been established to enrich teaching content and improve teaching quality. Utilizing information technology enables online sharing and collaboration of teaching resources, breaking geographical restrictions and providing rural students access to more extensive and better educational resources. The construction of smart classrooms is promoted in rural schools, equipped with intelligent interactive whiteboards, multimedia equipment, digital textbooks, etc., to improve teaching effects and students' learning experience. With the interaction and fun of smart classrooms, students' interest in learning can be stimulated and their enthusiasm for learning can be improved. We also need to strengthen the construction of rural school networks, provide stable and high-speed network connections, and ensure the online learning and teaching needs of teachers and students; establish a campus information management system, realize teaching management, student information management, and other aspects of information management to improve school management efficiency and service quality; establish an information communication platform between parents and schools, and use information technology to achieve home-school interaction and home-school cooperation. Through online parent-teacher meetings, parent questionnaires, and other forms, we can strengthen parents' understanding of and participation in school education work, promote the positive interaction between family education and school education, and jointly improve students' academic

performance and overall quality.

4.5. Strengthening the support from all sectors of society

Strengthening the support of all sectors of society, including the government, enterprises, social organizations, families, etc., is an important way to promote the balanced development of urban and rural education resources. The government can introduce relevant policies to encourage all sectors of society to participate in the construction of rural educational resources. We will set up a special fund to support the informatization of rural schools and the replenishment of educational resources. We will increase investment in rural teacher training and improve the professional level of rural teachers. At the same time, a monitoring mechanism will be established to ensure the transparent and effective use of government funds. Enterprises are encouraged to participate in the construction of rural educational resources and can support the information construction of rural schools by donating equipment, providing technical support, and carrying out public welfare activities. Companies can work with schools to provide internships, vocational training, etc., to encourage students to better integrate into society. In addition, businesses can carry out volunteer activities to support the school's educational activities and student development. Social organizations such as NGOs and charities can support rural education by carrying out voluntary education activities, providing volunteer services, and organizing educational public welfare projects. Professionals, education experts, and other resources are encouraged to provide training, guidance, and support to rural schools. At the same time, social organizations can play a coordinating role to promote the integration and sharing of resources of all parties and realize the optimal allocation of resources. Families are the most important supporters of children's education, and parents should strengthen the guidance of children's education. Government departments may carry out family education guidance activities to enhance parents' education awareness and level. At the same time, parents are encouraged to actively support the school's educational work and promote the all-round development of students by participating in parent-teacher meetings and paying attention to students' learning.

5. Conclusion

Through the in-depth study of the unbalanced distribution of educational resources in urban and rural areas, we can see that this problem has become the main obstacle restricting the balanced development of education in our country. To promote the balanced development of compulsory education, it is necessary for the government, schools, and society to work together to promote the balanced development of urban and rural educational resources and lay a solid foundation for the long-term development of education in our country.

Disclosure statement

The author declares no conflict of interest.

References

- [1] Sun F, Xie L, 2008, On the Urban-Rural Differences in Classroom Environment in Compulsory Education in the Eastern Coastal Developed Areas of China. *Frontiers of Education in China*, 3(2): 279–294.
- [2] Duer JK, Jenkins J, 2023, Paying for Preschool: Who Blends Funding in Early Childhood Education? *Educational Policy*, 37(7): 1857–1885.
- [3] Jin T, Wang T, Zhang Y, 2024, Education Empowers Residential Energy Transition: Causal Evidence from

Compulsory Schooling Reform in China. *The Journal of Development Studies*, 60(6): 914–931.

- [4] Byker JE, 2015, The One Laptop School: Equipping Rural Elementary Schools in South India Through Public Private Partnerships. *Global Education Review*, 2(4): 126–143.
- [5] Hatsor L, 2012, Occupational Choice: Teacher Quality Versus Teacher Quantity. *Labour Economics*, 19(4): 608–623.

Publisher's note

Bio-Byword Scientific Publishing remains neutral with regard to jurisdictional claims in published maps and institutional affiliations.