Comparative Analysis of the Changes in Academic Qualification of New Full-time Teachers and the Trend of Postgraduates' Retention

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Abstract: The development of education is inseparable from the addition of new teachers, and the postgraduates working in the alma mater after graduation is affected by the teachers' personal ability. In this study, the trend of academic structure changes and the trend of postgraduate retention rate were compared and analyzed, taking the changes in the academic structure of full-time teachers in colleges and universities in the past 11 years as a measuring factor. The study results showed that the proportion and change of full-time teachers with high education in colleges and universities had a positive relationship with the retention rate of postgraduates; the overall education structure of full-time teachers in colleges and universities tended to increase the proportion of the number of highly educated teachers, which indicates that teachers with scientific research ability and more professional knowledge will be more and more popular in colleges and universities, and the country's efforts to popularize higher education are gradually increasing. It was concluded that the improvement of the educational levels of full-time teachers in colleges and universities will improve the conditions for colleges and universities to recruit teachers, which makes education occupation candidates face greater entry challenges, and is very beneficial for candidates with master's degrees, especially graduate students from their own schools. In addition, a good on-campus learning environment and a space that allows for innovative research can greatly attract postgraduates to return to their alma mater.

Keywords: Education scale, higher academic qualifications, teachers' education structure, retention rate of postgraduates

1. Introduction

For hundreds of years, Chinese people have been adhering to the educational philosophy of "respecting teachers and attaching importance to morality". Teachers play an important role in preaching and teaching and guiding the way forward during our growth. Full-time teachers in colleges

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and universities not only teach basic courses, but also undertake the task of scientific research. The results of the report "Statistical Investigation and Analysis of the Present Situation of Postgraduate Entrance Examination" show that due to the change in the social environment, graduate students have relatively better treatment, and university teachers are obliged to give suggestions and guidance according to the situation of different students. Among them, the personal teaching level of full-time teachers in colleges and universities can directly affect their students' learning attitude, goals and methods, and then affect students' future planning, and indirectly guide the future development direction of the whole society to some extent.

At present, researchers at home and abroad are still in the process of exploring and testing how to be a good teacher. However, when countries formulate educational policies and set up teachers' teams, the excellent personal ability and professional quality of full-time teachers in colleges and universities have always been the basic requirements, and the corresponding assessment data of teachers' professional level has also become the key indicators for countries to improve their educational level.

Chen Ni mentioned in the research that students' academic achievements and academic achievements are influenced by teachers' teaching ability and methods, and teachers' career planning for students is also closely related [1]. Teachers' personal professional quality, which includes the teaching level and the accuracy of imparting knowledge, is an important measurement factor and closely related to teachers' personal knowledge reserve. With the expansion of education scale, colleges and universities have higher requirements for the academic qualifications of teachers. In the long run, the competitiveness and professional quality of full-time teachers in colleges and universities will show an upward trend. Recruiting full-time teachers in colleges and universities often has the advantages of high education and more experience at the same time, which has great advantages for graduate students who have graduated from our university. It is likely to lead to the situation that graduate students in colleges and universities tend to choose to stay in school for employment in the future.

Based on the academic qualifications of full-time teachers in colleges and universities, this paper compares the structural change trend of academic qualifications of full-time teachers in colleges and universities with the change trend of the number and ratio of graduates staying in schools, and explains the possible reasons behind them.

2. Literature Review

At home and abroad, there have been many detailed studies and research on the relationship between the measurable factors of college or university teachers' personal abilities and the future employment of graduated students. The existing literature mainly discusses the influences of the academic qualifications, teaching methods, teaching years and personal positions of college teachers on the graduate students' achievements and employment [2].

From the perspective of the situation of postgraduate students retaining in universities, previous studies have shown that the position of teachers with postgraduate academic qualifications in the education system is special: they are not only scientific researchers for academic research, but also full-time teachers in colleges and universities to educate the new generation of students. Zhang Yang and Zhang Zhongwu found that young teachers recruited by universities usually have high academic qualifications, especially the full-time teachers of "Double First-Class" universities [3]. Most of them are overseas returnees or graduated from domestic colleges and universities, with strong academic levels and scientific research abilities. These new full-time teachers who have graduated from universities and colleges have just experienced the process of changing from student status to teacher status. They have a very clear understanding and recognition of the students' learning direction, planning and time management. Thus they are able to give reasonable and appropriate suggestions to

students in the professional field, and even have certain impacts on the employment of the graduated students.

Many studies have shown that the scientific research achievements and levels of teaching progress made by schools are largely related to the improvement of teachers' personal abilities. Highly educated teachers need a broader platform and more teaching exercises during their term of office, as a result of applying the knowledge and methods, they have learned before teaching and doing scientific research tasks. Due to the research of Ma Hongmei, and the small sample data of teachers and students, it is not possible to draw a more accurate policy application advantage for the time being [4]. Luckily, the positive effect of teachers' abilities and academic qualification improvement on the degree of students' achievement has been proved in the sample analysis of Sonam Gyaltsen [5].

In terms of the ability of schools to improve their performance, the difference between the influence of teachers, principals and organizational levels, and the difference between the quantifiable influence of school teachers, Hanushek and other three scholars have carried out very in-depth research on the educational policies and school factors discussed in Coleman's research for a long time [6]. They pointed out that although there is no significant relationship between teachers' academic qualifications and teaching level, if incentive measures are adopted, full-time teachers in colleges and universities can be stimulated to improve their academic qualifications and other externally measurable aspects through self-learning professional knowledge. As a result, the competitiveness and professional quality of existing teachers and enrolled teachers will be quickly improved.

Nowadays, although there is no very precise standard, teachers' academic qualifications are indeed an important indicator that can be used to measure teachers' personal specialties. Improving teachers' academic qualifications will enable teachers to master their teaching knowledge more systematically and comprehensively to promote the improvement of teaching quality. Li Haiyun has demonstrated that academic education is very important in China's education system [7]. However, there are still problems to be explored in the curriculum setting and the communication between full-time teachers and students. In addition, Wang Zhonghua also pointed out that there are still full-time teachers with doctoral degrees in colleges and universities who "boil dumplings in a teapot" – they can't pour the knowledge out in their classes" [8].

Yang Hong pointed out that after China strengthened its education construction and liberalized the enrollment scale, the number of teachers recruited by colleges and universities become increasing year by year [9]. However, due to the small number of full-time teachers in colleges and universities, a large amount of the teachers' personal qualifications are still in the stage of undergraduate graduation. These kinds of teachers are limited by their knowledge and teaching quality, so they can only have a certain understanding of the professional knowledge in the undergraduate stage.

From the practical significance of education construction, most of the documents indicate that when recruiting teachers, colleges and universities should adjust the enrollment structure of teachers' academic qualifications and teaching goals. Academic qualifications can effectively further select teachers with professional scientific research and academic literacy, and attract high-quality teachers with forward-looking vision and global vision, laying a foundation for the improvement of the overall teaching level and the quality of teaching personnel. Heidi Byrnes stated that full-time teachers in universities still need to increase the practice of different educational methods and different educational objectives when teaching postgraduates [10]. When cultivating postgraduates, college teachers should conduct more standardized and systematic teaching, so that postgraduates who intend to stay in school can understand the real classroom and make full preparations. Qiao Pengchao took the structure of full-time teachers in colleges and universities in Yunnan as an example to illustrate that the current management and selection system of full-time teachers in Colleges and universities

still needs to be improved [11]. It is of great significance to carry out teacher training and improve the educational threshold for recruiting teachers.

It is worth mentioning that Lumsden and the other four people first analyzed the psychology of graduate students in the United States and Canada, and pointed out that there is a big gap between the actual situation of simulated teaching as students and classroom teaching as teachers [12]. Strengthening the relationship between the postgraduate student' understanding of classroom teaching and the knowledge they have learned and studied will have a far-reaching impact on the further optimization and reform of the structure and personnel composition of higher education.

Based on the existing academic research results on the influencing factors of teachers at home and abroad, at present, the personal teaching level of teachers has a more obvious impact on students' performance. Students' future employment choices and academic learning choices are also affected by the teaching methods and teaching quality of full-time teachers in colleges and universities to a large extent, and even depend on the guiding suggestions given by full-time teachers. Although the existing research on the level of full-time teachers is very valuable, most of them are based on the measurable professional qualities of full-time teachers in colleges and universities such as their teaching methods, teaching years and positions. The results and analysis of the experiment are based on the comparison of the comprehensive professional standards and abilities of teachers and achievements of graduate students, Therefore, there is little information about the comparative analysis of the changing trend for the academic qualifications of the teachers recruited by colleges and universities, and the trend of whether the graduate students will choose to stay in the school and devote themselves to the education industry in the future. This study is based on the number of full-time teachers in colleges and universities, and compares the trend between the number of full-time teachers and the number and change rate of graduate students.

3. Methods

3.1. Database

In this study, the CNKI database China Education Statistics Yearbook was used to obtain the data including the number of full-time teachers with different academic qualifications and the number of graduate students staying in school from 2010 to 2020.

The study aims to analyze and compare the trend of postgraduates assigned to work at Alma Mater after graduation over the past 11 years, according to observing the changes occurring to the number and structure of full-time teachers in colleges and universities, including the proposition of postgraduate students in the university.

3.2. Methods

3.2.1. Preliminary Analysis

The study used the Excel worksheet to preliminary screen and classify the obtained data, compiled the total number of teachers with different academic qualifications in the past 11 years, the number of new teachers and the number of graduate graduates in the current year, and made some simple statistical maps for preliminary analysis.

What's more, the study selects the excel worksheet to classify the on-the-job education information of teachers, and calculate the proportion of the number of new teachers enrolled in each education level in the current year and the growth rates relative to the previous year.

In addition, the study selects an excel worksheet to screen the number of postgraduates assigned to work at Alma Mater after graduation and the full-time teachers for calculating the year-on-year growth rates during current years.

Last but not least, the study selects the excel worksheet to make the collected and classified data into different tables for creating charts.

3.2.2. Depth Analysis

In the study, Stata statistical software was used to further analyze the collated Excel data, compare the correlation of the changing trends of different samples in the past 11 years, and conduct regression analysis on the number of graduate students and the number of new teachers graduating in the same year.

3.3. Description of Samples

Teachers' guidance and suggestions play an important role in the choice of future employment for graduate students.

The study further subdivides the factors affecting the employment of postgraduates into the growth rates of teachers enrolled in colleges and universities, the rates and year-on-year growth rates of teachers enrolled in various academic degrees, temporarily excludes the factors affecting the positions of teachers enrolled (see Table 1).

Classification Samples Time Doctor Academic Master **Oualifications** Undergraduate Junior college and below Teachers enrolled this year Growth of enrolled teachers this year Postgraduates assigned to work at Rates 2010-2020 Alma Mater this year Growth of postgraduates assigned to work at Alma Mater this year Doctor Year-on-year Master growth rates of Undergraduate teachers' academic qualification Junior college and below

Table 1: Description of samples.

3.4. Research Hypothesis

In this study, the following three kinds of hypotheses are made, which are named H1, H2 and H3 respectively.

H1: The proportion of full-time college teachers with high academic qualifications is in the same direction as the rates of postgraduates assigned to work at Alma Mater, and teachers with high education are more popular.

H2: The proportion of full-time college teachers with high academic qualifications is in line with the rates of postgraduates assigned to work at Alma Mater. Higher academic qualification increases employment opportunities, and the number of postgraduates assigned to work at Alma Mater after graduation increases.

H3: The year-on-year growth rates of the enrollment of full-time teachers with high academic qualifications is consistent with the rates of postgraduates in the enrollment of full-time teachers, and some of the enrolled teachers are graduate students of the university.

4. Results

4.1. Calculation Results Analysis

Table 2 is a summary of the number of in-service teachers, postgraduates, and recruited full-time teachers of various educational levels in colleges and universities in the past 11 years.

Table 2: The Number of In-service Teachers of Various Educational levels, the Number of Postgraduates of the School, and the Number of Full-time Teachers Recruited (2010-2020)

Year	Total	Number of doctorates	Number of postgraduates	Number of undergraduates	Number of junior colleges and below graduate	Number of postgraduates in the current year	Number of full-time teachers recruited
2020	1832982	513062	681535	624531	13854	728627	180082
2019	1740145	475787	639922	610369	14067	639666	160184
2018	1672753	433807	612308	611594	15044	604368	128545
2017	1633248	397974	596302	621137	17835	578045	118235
2016	1601968	366289	581615	634501	19563	563938	104976
2015	1572565	338442	569321	645068	19734	551522	101867
2014	1534510	313136	552854	648230	20290	535863	103162
2013	1496865	285353	535784	654660	21068	513626	115851
2012	1440292	254399	513793	651623	20477	486455	102896
2011	1392676	227400	488373	655118	21785	429994	102763
2010	1343127	200337	463401	656991	22398	383600	98438

Table 3 is a further calculation of the proportion of in-service and retention rate of in-service teachers of various educational levels, the proportion of recruited postgraduates, and the proportion of postgraduates in the total recruited teachers corresponding to Table 2.

Table 4 is the calculation of the growth rate of the total recruited teachers, the growth rate of the number of teachers of various educational levels, and the growth rate of the number of retained graduates on the basis of Table 3.

Table 4: The Growth Rate of the Total Number of Teachers Recruited, the Growth Rate of the Number of Teachers of Various Educational levels, and the Growth Rate of the Retained Graduates (2010-2020)

Year	Total growth rate	Growth rate of doctorates	Growth rate of postgraduates	Growth rate of undergraduates	Growth rate of junior college graduates or below	Growth rate of retained graduates
2020	5.3350%	7.8344%	6.5028%	2.3202%	-1.5142%	2.11%
2019	4.0288%	9.6771%	4.5098%	-0.2003%	-6.4943%	19.44%
2018	2.4188%	9.0039%	2.6842%	-1.5364%	-15.6490%	5.42%
2017	1.9526%	8.6503%	2.5252%	-2.1062%	-8.8330%	8.22%
2016	1.8697%	8.2280%	2.1594%	-1.6381%	-0.8665%	-1.18%
2015	2.4799%	8.0815%	2.9785%	-0.4878%	-2.7403%	0.41%
2014	2.5149%	9.7364%	3.1860%	-0.9822%	-3.6928%	-0.20%
2013	3.9279%	12.1675%	4.2801%	0.4661%	2.8862%	-5.61%
2012	3.4190%	11.8729%	5.2050%	-0.5335%	-6.0041%	2.44%
2011	3.6891%	13.5087%	5.3889%	-0.2851%	-2.7369%	2.23%
2010	3.6965%	13.9107%	6.7346%	-0.5636%	-8.5759%	-23.82%

Table 3: Proportion and Retention Rate of In-service Teachers of Various Educational levels, and Proportion of Recruited Postgraduates Retained of Our School after Graduation, and the Proportion of Postgraduates of the School in Total Faculty Recruited (2010-2020)

Year	Proportio n of doctorates	Proportio n of masters	Proportion of undergraduate s	Proportio n of junior college and below graduates	Proportion of postgraduate s working in the alma mater	Retention rate of postgraduate s after graduation	Proportion of postgraduates of the school in total faculty recruited
2020	27.9906%	37.1818%	34.0719%	0.7558%	84.94%	8.5484%	34.5876%
2019	27.3418%	36.7741%	35.0758%	0.8084%	86.84%	9.5358%	38.0793%
2018	25.9337%	36.6048%	36.5621%	0.8994%	85.75%	8.4503%	39.7301%
2017	24.3670%	36.5102%	38.0308%	1.0920%	85.53%	8.3810%	40.9743%
2016	22.8649%	36.3063%	39.6076%	1.2212%	84.22%	7.9379%	42.6431%
2015	21.5217%	36.2033%	41.0201%	1.2549%	84.56%	8.2135%	44.4688%
2014	20.4063%	36.0280%	42.2435%	1.3222%	83.79%	8.4191%	43.7322%
2013	19.0634%	35.7937%	43.7354%	1.4075%	82.71%	8.8012%	39.0199%
2012	17.6630%	35.6728%	45.2424%	1.4217%	80.95%	9.8453%	46.5451%
2011	16.3283%	35.0672%	47.0402%	1.5643%	80.32%	10.8727%	45.4950%
2010	14.9157%	34.5017%	48.9150%	1.6676%	83.11%	11.9213%	46.4556%

Figure 1 are the proportion of the number of teachers of various educational levels, the changes in the number of teachers of various educational levels and the proportion of graduate students of our school, and the comparison of retention rate from 2010 to 2020.

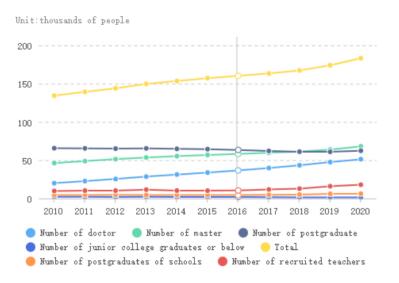


Figure 1: The Number of In-service Teachers of Various Educational levels, the Total Teachers, the Number of Postgraduates and the Number of Recruited Teachers (2010-2020).

It can be seen from Figure 1 that the overall number of in-service teachers in colleges and universities has increased significantly in the past 11 years, increasing to 1,832,982 at the end of 2020 from 1,343,127 at the beginning of 2010, with a growth rate of 36.4712%. In addition, number of teachers recruited was also increasing year by year. Although the number of postgraduates recruited of our school was not dominant in general, it still maintained a relatively stable growth rate.

The number of in-service teachers with doctoral and master's degrees has shown a steady upward trend, increasing by 312,725 and 218,134, respectively, from 2010 to 2020. The number of in-service teachers with bachelor's degree, junior college degree or below has gradually decreased in the past 11 years, decreasing to 624,531 at the end of 2020 from 656,991 at the beginning of 2010, a total decrease of 32,460.

The number of teachers recruited with a junior college degree or below dropped by 38.1463%. In the long run, it is very likely that the number of recruited teachers with a junior college degree or below would continue to decline following the current trend.

Through the analysis of the Figure 1, it can be found that although the overall recruitment trend of colleges and universities was on the rise, the educational structure of the teachers recruited was constantly changing, and the year-on-year increase in the proportion of teachers with a high degree of education became a very obvious trend. This shows that the educational level of teachers has gradually become a very important entry measurement indicator, the requirements of colleges and universities for the teachers' educational levels were constantly increasing, and the number of recruited postgraduates of our school was also increasing year by year accordingly.

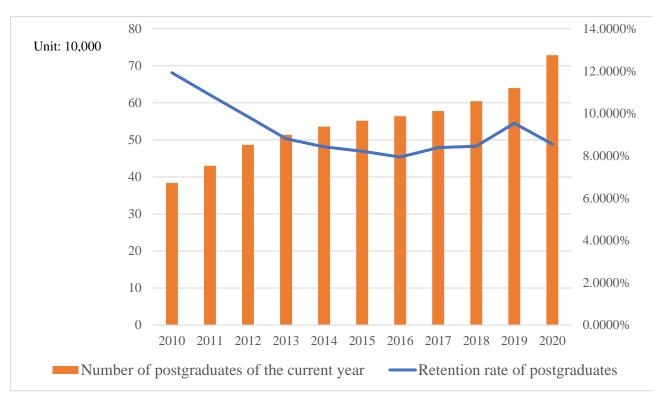


Figure 2: The Number of Postgraduates and the Retention Rate of Postgraduates (2010-2020).

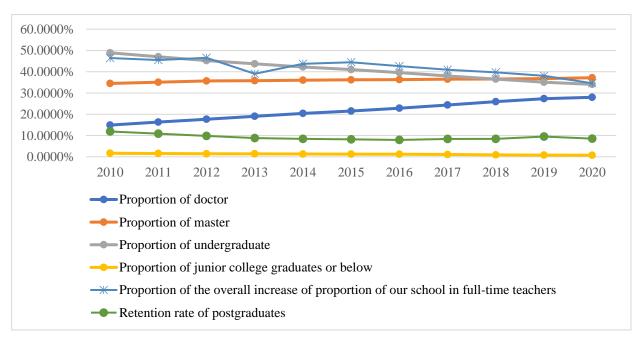


Figure 3: The Proportion of In-service Teachers of Various Educational Levels, the Promotion of Postgraduates of our school in the Total Recruited Teachers, and the Retention Rate of Postgraduates (2010-2020).

It can be seen from Figure 2 that the number of graduate students was increasing rapidly in recent years, increasing to 728,627 at the end of 2020 from 383,600 at the beginning of 2010, which was nearly doubled. This shows that China was gradually strengthening education construction and

expanding the enrollment of higher education, so that people with Bachelor's Degree or even lower degree have more opportunities to access academic knowledge in professional fields, and master more systematic and comprehensive knowledge through the learning platform provided by universities, so as to cultivate talents from generation to generation. It can be seen from the retention rate of postgraduates that only a small number of postgraduates choose to work in the Alma Mater after graduation, and the curve shows a fluctuating downward trend, which indicates that the employment direction of postgraduates after graduation in the past 11 years was gradually tending to work outside school, and the number of postgraduates who decide to continue to work in the education field was also decreasing year by year.

It can be seen from Figure 3 that the proportion of teachers of various educational levels recruited by colleges and universities has had an obvious change trend in the past 11 years, while the change of the retention rate of postgraduates has been at a low level.

The number of full-time teachers with doctoral degrees recruited by colleges and universities has increased the most from 2010 to 2020, from 14.9157% at the beginning to 27.9906%, and the proportion was nearly doubled. The number of full-time teachers with master's degrees recruited by colleges and universities has increased by only 2.6801% in the past 11 years.

The proportion of full-time teachers with bachelor's degree recruited by colleges and universities has decreased at a relatively rapid rate, from 48.9150% at the beginning to 34.0719% in 2020, but still accounted for a large part. The proportion of full-time teachers with junior college degree recruited by colleges and universities has been very low, and has shown a slow downward trend, accounting for 1.6676% in 2010 and only 0.7558% in 2020.

In Figure 3, the retention rate of postgraduates showed a fluctuating downward trend, decreasing by 3.3729% in the past 11 years. The proportion of postgraduates of our school in the total recruited full-time teachers was very high, but in the long run, it was in the process of fluctuation and decline. In 2010, the proportion of postgraduates of our school in the total recruited teachers reached a peak of 46.4556%; in 2013, it reached a short valley of 39.0199% and then returned to a relatively normal proportion, decreased slowly to 34.5876% in 2020.

4.2. Regression Results Analysis

In this study, Stata statistical analysis software was used to analyze the sample number and different proportions. Table 5 is a descriptive statistical analysis of the sample data of the number of new college teachers with different academic qualifications and the number of graduate students of the University in the past 11 years.

	Mean	Std. Dev.	min	Median	max
total	1569193.7	148336.21	1343127.000	1572565	1832982
postgraduate	546882.18	95619.529	383600.000	551522	728627
teacher	119727.18	26850.984	98438.000	104976	180082
doctor	345998.73	102013.25	200337.000	338442	513062
master	566837.09	65181.662	463401.000	569321	681535
undergraduate	637620.18	17912.608	610369.000	645068	656991
Junior college and below	18737.727	3087.83	13854.000	19734	22398

Table 5: Descriptive statistics of the sample numbers.

According to Table 5, the total number of new teachers in the past 11 years has the smallest change compared with the number of graduate students and the total number of in-service teachers, which indicates that the number of new teachers in the education industry has changed relatively little in the

past 11 years. In general, the number of teachers in colleges and universities has not increased significantly.

From the perspective of the number of teachers with different degrees, the number of new teachers with doctoral degrees fluctuates the most, the number of new teachers with junior college degrees and below changes the least, and the number of teachers who stay in school after graduation accounts for a large proportion of the total number.

Table 6 is the correlation analysis of the sample data of the number of new college teachers with different degrees and the number of graduate students of the university in the past 11 years.

Variables	(1)	(2)	(3)	(4)	(5)	(6)	(7)
(1) postgraduate	1.000						
(2) total	0.990	1.000					
(3) doctor	0.973	0.995	1.000				
(4) master	0.993	1.000	0.993	1.000			
(5) undergraduate	-0.798	-0.859	-0.906	-0.855	1.000		
(6) junior college and below	-0.913	-0.941	-0.962	-0.937	0.925	1.000	
(7) teacher	0.843	0.852	0.851	0.843	-0.701	-0.891	1.000

Table 6: Pairwise correlations.

According to the experimental data in Table 6, there is a positive relationship between the number of graduate students and the total number of new teachers in the past 11 years. The number of newly added teachers with doctorate and master's degrees is consistent with the total number of teachers. However, the number of teachers with bachelor's degree or below has a negative relationship with the total number of newly added college teachers and the number of graduate students in the university. It shows that the number of highly educated teachers has increased year by year in the past 11 years, which has become one of the trends of the change in the academic structure of college teachers. In addition, colleges and universities have higher and higher requirements for the academic ability and scientific research level of the full-time teachers recruited. The graduate students of the university have high academic qualifications, most of them meet the standards of recruiting teachers, and will have many opportunities to continue to work in the university.

According to the regression results, there is a positive relationship between the number of graduate students and the number of new teachers in colleges and universities in the past 11 years

\mathcal{E}		1	\mathcal{E}
Total	teacher	postgraduate	_cons
Coef.	.3380127	1.456142	732386.2
Std . Err .	.492101	.1381872	41521.64
t	0.69	10.54	17.64
P> t	0.512	0.000	0.000
[95% Conf . Interval]	[7967744,	[1.137482	[636637.1
	1.4728]	,1.774803]	,828135.3]
Number of obs		11(year)	
F(2,8)		213.41	
Prob>F		0.0000	
R-squared		0.9816	
Adj R-squared		0.9770	
Root MSE		22495	

Table 7: Regression between the number of teachers and postgraduates.

But from Table 7, the correlation coefficient of the change of the number of graduate students on the change of the number of new full-time teachers is not large, which indicates that the change of the number of graduate students in colleges and universities during the past 11 years has no significant impact on the number of new teachers. Thus, the result can be drawn that the number of graduate students who choose to stay in the university in that year is not large.

Table 8: Pairwise correlations of the retention rate of postgraduates and the proportion of the number of postgraduates among the enrolled teachers.

Variables	(1)	(2)
(1) rate	1.000	
(2) POST	0.489	1.000

Table 8 shows that among the teachers recruited by universities or colleges, there is a weak positive relationship between the retention rate of graduate students and the graduate students of the university. The coefficient indicates that some of the teachers recruited by the university are graduate students of the university or college.

Table 9: Pairwise correlations of the proportion of the number of postgraduates among the enrolled teachers and the proportion of the new teachers' academic qualification.

Variables	(1)	(2)	(3)
(1) rate	1.000		
(2) DOC	-0.834	1.000	
(3) MAS	-0.799	0.961	1.000

Table 9 shows that the proportion of graduate students staying in the university has a relatively obvious inverse relationship with the total number of graduate teachers enrolled. It means that the number of graduate students who choose to stay in universities in recent 11 years is gradually decreasing, and more graduate students choose to work outside the university to accumulate social experience has become a trend.

5. Discussion

The results show that the proportion and change of full-time college teachers' high education have a positive relationship with the employment rate of graduate students. It represents that the proportion of full-time college teachers with high academic qualifications is consistent with the change direction of the graduate retention rate. The results indicate that teachers with high academic qualifications are more popular. So, hypothesis H1 holds.

Table 2 shows that the proportion of full-time teachers with high academic qualifications enrolled in colleges and universities is in the same direction as the growth rate of graduate students staying in school. The enrollment rate of postgraduates from school is about 80%-90%, and the success rate of admission is very high, which shows that graduate students from our school have a unique advantage when recruiting full-time teachers. Hypothesis H2 holds for the results prove that high academic qualifications increase employment opportunities, and the number of postgraduates staying in school increases.

The regression results indicate that the growth rate of high academic qualifications of full-time teachers in colleges and universities is consistent with the changing trend of the ratio of postgraduates translated into full-time teachers. So, some of the recruited teachers are the postgraduates of colleges and universities, hypothesis H3 holds.

The improvement of the academic qualifications of full-time teachers in colleges and universities will raise the conditions for recruiting teachers in colleges and universities, which will be more challenging for candidates in the education industry. More opportunities for working in schools will be invested in the strongest comprehensive competitiveness, such as better teaching methods, higher classroom efficiency, wider horizons, more comprehensive professional knowledge reserves and more innovative scientific research capabilities. The change of full-time teachers' academic structure and the improvement of academic requirements can make the school screen out some candidates with low academic qualifications and low teaching level before the formal interview, which is very beneficial to candidates with postgraduate qualifications.

The reason why graduate students stay in school is not only the change and promotion of a single teacher's academic structure, but the academic relationship is also an important factor for graduate students to consider staying in school.

The academic relationship is mainly linked by the behavior of "learning together". The unique groups formed by people who have attended the same class, been taught by the same teacher or graduated from the same college are the carriers and origins of "academic relationships". Liu Liming pointed out that it is precise because of the unique academic relationship that connects people that people are often influenced by academic relationships when making decisions [13]. The research results of another scholar, Zhong Yunhua, show that the popularization of higher education makes the academic relationship play an increasingly significant role in the academic career development of university teachers, and university teachers with rich academic relationships and longer time in the same school have more advantages in academic research development [14].

Because this study is based on the data of the past 11 years for comparative analysis of graph trends, and regression analysis, the correlation between the compared data is not fully demonstrated. In addition, the sample data used in this study is obtained from the National Statistical Yearbook, and it is only a screening analysis of the national statistical data, but there is no detailed classification and elaboration of the differences in specific regions and humanities. The results of this study may not be of reference value for the accurate reform of colleges and universities. Finally, besides teachers' academic qualifications, there are many factors that can be used to measure and compare the influence of teachers' personal levels on students' staying in school.

6. Conclusion

In recent years, China is constantly strengthening the construction of education, and higher education has begun to reach the masses. According to the data, at present, most graduate students choose to look for off-campus jobs after graduation, instead of continuing to engage in education. "Only getting in and not getting out" is obviously a vicious circle for the current education industry. Strengthening the propaganda of education and appropriately increasing the subsidy of educational personnel will be very attractive to the "return" of graduate students; At the same time, a good campus learning environment and development space for innovative research are also necessary conditions for cultivating and absorbing talents.

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