Countermeasures to Improve the Teaching Ability of Physical Education Teachers in Local Colleges and Universities in the Context of “double first-class” Discipline Construction

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Abstract: With the advancement of the reform of physical education (PE) and health curricula, China has paid more and more attention to cultivating students’ core PE literacy and at the same time put forward higher requirements for PE teachers. In order to achieve the overall goals of PE and health curricula, the teaching ability of PE teachers is a top priority. Therefore, improving the teaching ability of PE teachers is of great significance to promote the specialization of PE teachers and improve the quality of education. Through questionnaires and surveys of teachers and students from three universities in City A, starting from four dimensions, the two teaching abilities of PE teachers in City A were discussed and analyzed in depth, with a view to providing a reference for improving the teaching level of PE teachers in City A. Studies have shown that when analyzing the teaching goals of PE teachers and the ability to design lesson plans, more than 50% of teachers expressed great agreement with their own evaluation, of which 89% of teachers expressed great agreement when writing lesson plans, taking into account whether the teaching time of each part is reasonable. Therefore, in the context of the construction of “double first-class (DF-C)”, the research on the improvement of PE teaching capabilities in local colleges and universities (CU) is very valuable.

1. Introduction

In October 2015, the State Council clarified the pace of accelerating the construction of world-class universities and first-class disciplines, and clarified the goals and tasks of “DF-C” [1]. Local universities are the main force of higher education in China, and they should actively participate in the construction of “DF-C”. This is an important choice for local universities in the
process of “DF-C” construction, and it is also an important issue facing the current development of higher education in China [2]. However, due to the strength gap with subordinate CU, local CU cannot fully compete with major universities in the construction process of “DF-C”. Therefore, local CU should pay attention to the construction of “DF-C”, and must take subject majors as breakthroughs, take characteristic majors and dominant majors as the lead, and play their due role in the construction of “DF-C” [3-4]. However, PE teachers, as the main body of PE teaching, must strive to improve their own teaching ability and teaching quality, and further promote the in-depth development of quality education reform. This is of great significance for future social development and student academic improvement [5].

Ko M S aims to explore the content and value of the teaching experience of PE teachers and educators. He collects data based on the participants' class diaries and analyzes the analysis results based on regional analysis and classification analysis. The results show that classifying the content of teaching experience according to the anxiety and traces of classroom flow is conducive to the establishment of a healthy body, the cultivation of cognitive ability and the cultivation of personality [6]. Erba K aims to determine the relationship between the teaching effectiveness of PE teacher candidates and task-centered anxiety. In this study, a relational screening model was used, and descriptive statistics were used in the analysis of the data in the study [7]. The teaching perspective in initial teacher education is a useful analytical tool for exploring the development of professional identity and supervising the cooperative practice of teachers and protecting teachers in school placement. Mariana studied how the professional identity of PE teachers is challenged by the requirements of the new mentor role. Data was collected during the one-year school placement process, including three semi-structured interviews and weekly diary entries from cooperative teachers [8]. However, the overall process of teaching PE teachers is not very smooth, and the efficiency of the research methods used is not very obvious. I hope to improve it in future research.

Through empirical analysis of the evaluation of the quality of PE teachers in various CU in City A, three CU were selected as samples. Through sampling and data statistics, the main factors affecting the teaching level of PE teachers in CU in City A were identified, and ways to improve the ability of PE teachers in CU in City A were proposed.

2. Methods for Improving the Teaching Ability of PE Teachers under the “DF-C” Discipline

2.1. “DF-C” Discipline Construction

"DF-C" means to build a world-class university and a first-class major. This is a new demand for the development of higher education in China. “DF-C” points out the direction for the development of Chinese universities, puts forward clear requirements for the construction of first-class universities and first-class majors, and emphasizes that the goal of “DF-C” requires all universities to cooperate and build together, and requires each school to start from its own actual situation, find breakthroughs in development, and actively participate in it [9]. “DF-C" is the new normal for China's economy to enter a new normal, from high growth to medium and high-speed development, which has brought new needs to the development of higher education in China [10].

2.2. Local Universities

Generally speaking, Chinese universities can be roughly divided into two categories: one is a key university directly under the government; the second is a local university funded by provincial finance, that is, a local university [11]. Local CU are universities that are borne by local finances, allocated by local governments, coordinated by local governments, and responsible by local
governments. Among them, there are both public undergraduate CU, as well as independent colleges, vocational colleges, adult colleges and private universities.

2.3. Improvement of PE Teachers' Teaching Ability

(1) Understanding of teaching goals
Educational goals and curriculum goals are the guiding basis for specific curriculum goals, while subject goals are the specific embodiment of curriculum goals and educational goals. The three goals affect each other, undertake each other, and penetrate each other. Therefore, teachers should accurately grasp the cognitive ability of teachers in teaching, give appropriate guidance in the classroom, properly set and realize the purpose of classroom teaching, so that teaching activities can play a positive role in the development and formation of students. This is an important factor in the cognitive ability of teachers in teaching.

(2) Analytical power of teaching resources
The analytical ability of teaching resources is that teachers need to analyze the characteristics, influencing factors and composition of teaching resources in depth, including teaching curricula, teaching auxiliary resources, etc. [12]. Teachers should make full use of resources, surpass resources, and make creative use of educational resources to make educational resources better serve the development of the school; analyze, explain and screen resources, and after in-depth understanding, screen out teaching resources in order to carry out more professional and efficient teaching to meet the needs of students' learning and development.

(3) Awareness of the teaching object
Teachers should understand and master the situation of teachers from the perspective of their own conditions, physical and psychological development level, family education situation and social relationship development[13-14]. Teachers should understand, understand and master the objectivity, feasibility and pertinence of classroom teaching plan design as a whole and in all directions, so as to better complete classroom teaching tasks and improve the quality of classroom teaching[15-16].

3. Survey on the Teaching Ability of PE Teachers in Local CU

3.1. Questionnaire Design

Through the analysis of the abilities of PE teachers in actual teaching, and revised according to the needs of research, and designed a series of questionnaires (teachers and students), and analyzed the teaching ability of PE teachers in City A University.

3.2. Validity of Questionnaire

The design of the questionnaire should adjust the content of the questionnaire in a timely manner according to the actual situation, and finally go through final testing and evaluation to determine the rationality and feasibility of the questionnaire. By inviting experts to verify the validity of the questionnaire, and making follow-up corrections and optimizations based on the opinions of experts, the relevant data in Table 1 reflect that the questionnaire has high effectiveness and feasibility.

<table>
<thead>
<tr>
<th></th>
<th>Very effective</th>
<th>More effective</th>
<th>general</th>
<th>Not very effective</th>
<th>invalid</th>
</tr>
</thead>
<tbody>
<tr>
<td>Teacher questionnaire</td>
<td>4</td>
<td>1</td>
<td>1</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Student questionnaire</td>
<td>3</td>
<td>2</td>
<td>1</td>
<td>0</td>
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</table>

Table 1. Questionnaire validity test statistics
3.3. Questionnaire Reliability

In order to improve the credibility of the survey results, this study used the “retest method” to test the reliability of the survey questionnaire. In the 8 schools surveyed in City A, a total of 20 teacher questionnaires were distributed. 20 days after the first questionnaire survey, the same questionnaire survey was conducted on the same subject again. Through two questionnaires, it was concluded that the reliability coefficient of the questionnaire was 0.902. In view of the correlation coefficient between 0-1 and greater than 0.6, it is believed that the reliability of the teacher questionnaire meets the research requirements.

3.4. Questionnaire Issuance and Recycling

This article takes three middle schools in City A as samples, and one class is drawn for each grade, totaling 9 classes. Within 2 months, the distribution and recycling work was completed. In this study, PE teachers from three middle schools and students of all grades were selected as the subjects of the survey. A total of 26 valid teacher questionnaires and 2 invalid questionnaires were obtained. All respondents filled in the information in accordance with the regulations, and the recovery rate was higher; and 645 of the 654 student questionnaires were recovered, the recovery rate was 98.6%, of which 643 valid questionnaires were obtained, accounting for 98.3%.

4. Results and Discussion on the Teaching Ability of PE Teachers in Local CU

4.1. Ability of PE Teachers to Set Teaching Goals

The goal of PE is different from the teaching purpose of other disciplines. In the process of implementing PE, PE teachers have the main purpose of imparting PE knowledge and cultivating students' motor skills. The design of good educational goals should be comprehensive, including cognitive, emotional, and technical aspects. The design of good educational goals is often relatively clear and can cover three aspects, and the teaching goals are very practical, so the specific teaching conditions should be fully taken into account when designing. The result is shown in Figure 1:

![Figure 1. The ability of PE teachers in CU in City A to set teaching goals](image-url)
As can be seen from the data in the figure, 80% of teachers can fully take into account the design of teaching goals in the teaching design; in the design of teaching goals, 86% of PE teachers believe that when designing teaching goals, the design of teaching goals can be scientific and reasonable; in terms of the operability of teaching goals, 97% of PE teachers have great uncertainty about the design of their teaching goals.

4.2. PE Teacher Teaching Lesson Plan Design Ability

Before PE class, the preparation of lesson plans is an essential part. Good lesson plan design and writing ability is a key factor in the quality of PE teachers, and having excellent lesson plan writing ability is the key to ensuring the smooth progress of teaching. Therefore, PE teaching must pay attention to the preparation of teaching plans and improve the level of teaching plans. This paper takes the PE teachers of City A University as the research object, and investigates and analyzes their ability to prepare lesson plans. The result is shown in Figure 2:

![Figure 2: The ability of PE teachers in CU in City A to design teaching plans](image)

89% of teachers said they “very much agree” when writing lesson plans, 7% of teachers said they “agree” and 4% said they “disagree”. Classroom organization plays an important role in PE teaching. It runs through the entire teaching process, and it is directly related to the success or failure of the entire teaching. 84% of teachers “very much agree” that when they are writing a lesson plan, they believe that the teaching structure can be changed quickly and effectively. In terms of the innovation of teaching plans, 78% of teachers said that they attach great importance to the innovation of teaching methods, and 2% expressed “complete disapproval.”

4.3. Strategies for Improving the Teaching Ability of PE Teachers

(1) In daily sports activities, pay attention to the reasonable arrangement of inter-class exercises, PE classes and extracurricular activities to reduce the work intensity of PE teachers and ensure daily sports activities. In the long-term teaching practice, teachers' work fatigue has gradually formed, and the appropriate work difficulty is beneficial to the orderly progress of their teaching work. At the same time, schools should strengthen the training of PE teachers, improve their ability to work, so that they can better complete their daily work and reduce their work pressure.
(2) In the context of vigorously promoting the popularization of special education in the whole society, it is proposed that special scholarships, grants and other policies should be set up in the field of special education to attract more outstanding students to study in special education majors and strengthen special education training to promote the healthy development of special education. Strengthen pre-vocational and post-vocational training, enable special education teachers to participate in special education training at least once a year, promote the professional development of special education teachers, and improve their teaching level.

(3) In PE teaching in local CU, it is necessary to strengthen teachers' professional knowledge and skills, broaden students' horizons, and enrich their knowledge, so that teachers can gain a sense of accomplishment and satisfaction in their careers. It is necessary to set a good example for teachers, motivate students to learn from role model teachers, improve the recognition of special PE teachers in the society, improve the treatment of teachers, and improve the living standards of special education teachers.

5. Conclusion

The construction of sports majors in local CU is a very practical and creative topic. In past research, although some scholars have put forward their own opinions on the construction of sports majors in local CU, these opinions are not sufficient, in-depth, and lack specific examples. The purpose of this article is to take the improvement of the teaching level of PE teachers in CU in City A as an example analysis, and it has certain reference value for the ways and strategies to improve the curriculum of PE majors in CU in City A. World-class PE courses are a necessary condition for realizing China's higher education and becoming a sports powerhouse, and they are also the key to realizing the development of China's sports industry. In the context of “DF-C”, universities should conduct a comprehensive analysis of the development status of Chinese PE disciplines, grasp their connotations, and actively promote the construction of “DF-C”.

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Data Availability

Data sharing is not applicable to this article as no new data were created or analysed in this study.

Conflict of Interest

The author states that this article has no conflict of interest.

References