

# Research on the Application of PBL Teaching Method in Aerobics Teaching in Colleges and Universities

Miaomiao Wang

Northwest Normal University, Lanzhou 730000, China.

Abstract: According to the basis of the practice of aerobics courses and the PBL teaching method, the article simulates and builds the PBL teaching process suitable for aerobics courses. It integrates thinking and combines the problems arising in the curriculum and the shortcomings of traditional aerobics teaching. From the PBL teaching design of the aerobics course, the implementation process of the PBL teaching method, the implementation and effect of the PBL teaching method to explain how to apply the PBL teaching method in the aerobics course, so as to build a teaching method that is more suitable for modern aerobics courses, and improve the learning efficiency of students and the teaching quality of teachers in the process of aerobics teaching.

Keywords: PBL Teaching Method; Aerobics Teaching; College

#### Introduction

The "Aerobics" course is a compulsory course in public sports in colleges and universities. It is an important course to cultivate the all-round development of students' morality, intelligence, physique, beauty and labor, and to improve the overall quality. It accounts for a large proportion of physical education teaching in colleges and universities.

The PBL teaching method is a problem-based (i.e. asking questions) and project-oriented learning mode (i.e. completing research projects). Starting from the situation where the problem needs to be solved urgently, teachers put forward problem scenarios, students cooperate in groups, use known knowledge and existing means and skills to solve problems. Compared with traditional teaching, the PBL teaching method pays more attention to cultivating students' learning ability and teaching well.

## 1. PBL teaching design of aerobics courses

In China, the design process of the PBL teaching method is divided into the formation of discussion and learning groups, the design of questions (teacher design), group discussion and reporting (independent learning), summary feedback and multiple evaluation. Combined with the traditional PBL teaching method, the design is in line with the teaching process of aerobics courses. Combined with practical teaching and specific situations, the design process is as follows.

## 1.1 Determine the teaching content

On the basis of following the principles of the PBL teaching method, make appropriate adjustments to determine the teaching content that conforms to the aerobics course. When compiling the teaching content, according to the standards of the university public physical education curriculum and the learning level of students, the specific actual situation should be applied to the teaching of aerobics courses, so as to realize that the teaching content conforms to the learning situation, improve the cognitive level and problem-solving ability of students.

#### 1.2 Design aerobics classroom problems

The core of the PBL teaching method is to use problems to drive students' learning. Problem design in aerobics

classroom is the difficulty and focus of aerobics teaching. The design problems of the aerobics course mainly include theoretical knowledge, specific practice, learning methods, learning methods, and grasp and perception of music. In the pre-class preview, teachers can send questions and relevant learning materials designed in advance to students in the form of an information platform, and students can choose the learning method according to the teacher's preview content to learn independently.

#### 1.3 Panel discussion

According to the designed teaching problems, teachers randomly carry out preview homework in groups, and the number of people in each group does not exceed 8 people. The goal of students' learning is clarified in the established teaching content, and students' team communication ability and cooperation ability are cultivated.

## 1.4 Classroom display of learning results

Teachers provide a display platform, which is more conducive to stimulating students' interest in learning, mobilizing students to become protagonists in the classroom, giving full play to the main position of students, immersively participating in the learning process, stimulating learning motivation, and obtaining better teaching results. Teachers should constantly switch learning scenarios according to the specific class situation, so that students can gain happiness and knowledge in the teaching process.

## 1.5 Teacher summary feedback learning effect

Teachers summarize and comment on the learning results of each group, focusing on the process evaluation of students. Pay attention to correcting students' error problems in reporting learning, as well as knowledge misunderstandings and practice mistakes in the process of theoretical learning and practice, correct errors in a timely manner, and deepen students' understanding and flexible application in theory and practice.

## 2. Implementation process of PBL teaching method for aerobics course

Applying the PBL teaching method in the aerobics curriculum, teachers should introduce the detailed PBL teaching method concept rules, basic principles, operation process, learning methods and teaching effect to be achieved to students. When applying the teaching method, teachers should focus on observing students' process feedback, learning attitude, and adaptation, so that students When accepting the new teaching method, integrate into the role faster, complete the project problems assigned by teachers and teaching tasks.

#### 2.1 Select the teaching content of aerobics course

Teachers should follow the laws of teaching methods, arrange students to complete the whole process, and sort out the pre-class preview questions and theoretical knowledge related to aerobics. For example, based on the teaching content of "Classification and Characteristics of Aerobics", teachers arrange students to carry out pre-class preview questions: classification of aerobics, characteristics of aerobics, principles of aerobics, advantages and disadvantages of each item in fitness aerobics, the efficacy of fitness aerobics, competitive aerobics Competition procedures, classification of difficult actions of competitive aerobics. Through these questions, students can master the key points and difficulties of the aerobics course, fully understand the main content of the aerobics course, master the relevant knowledge of aerobics while collecting information, avoid entering knowledge misunderstandings, let students take the initiative to learn, become the main body of teaching, and truly achieve the purpose of teaching.

## 2.2 Pre-class preview group study

The main core of the PBL teaching method is to allow students to discuss and communicate in small groups and draw conclusions. During the teaching process, teachers should be randomly grouped in the pre-class preview session, with a group of 4-8 people, and each group should randomly set up a group leader and a learning recorder. The team leader leads the team members to discuss, communicate and learn. The learning recorder records the attendance of the team members, the discussion process, the completion of learning tasks, the ways to solve problems, the means to acquire knowledge, and the

problem-solving ideas and innovations of each team member. The members of each pre-class preview group are not fixed, and the group leader and learning recorder take turns to achieve each group to divergent thinking, update the knowledge, learn from each other, complement each other's advantages, exercise students' sensitivity to the learning environment, and become the main body of learning in the pre-class preview.

## 2.3 Design and presentation of questions

In the first part of problems in the PBL teaching method, in the course teaching of "Classification and Characteristics of Aerobics", teachers can design problems according to the actual situation: (1) In college sports, which type of aerobics does the aerobics course mainly use? (2) What is the difference between unarmed aerobics and aerobics? 3) What is the fundamental difference between fitness aerobics and competitive aerobics? 4) Please show aerobics and aerobic dance for no less than 1 minute, and summarize your feelings after practice. 5) Please tell if you have met the requirements of aerobics after practicing aerobics, and why? 6) Do you think the characteristics of aerobics are the same as after your practice? Why? After the teacher releases the task, under the organization of the team leader, the students sort out and analyze through different learning channels, consult and retrieve relevant knowledge, summarize the unquestioned problems, and form the overall and personal views of the group through inter-group learning.

## 2.4 Report on fixed group discussion in class

When studying in class, the teacher is a fixed member of the study group and takes turns to serve as the team leader and learning recorder. After each team member collects the learning materials, the team leader sorts out and convenes the team members for class discussion and exchange, supplements and explains on the basis of learning materials, screens and judges the known learning content, and forms different views on the basis of conclusions, pending the teacher's comments and summary. Through discussion, the advantages of students' learning team members make up for their own learning shortcomings, deepen the intuitiveness of curriculum learning, and change from passive learning to active learning.

## 2.5 Student feedback, teacher summary comments

Since the teaching form is presented in a cooperative group, the final teaching results are also displayed in a group. When summarizing the comments, teachers should observe the group's teamwork ability, team performance ability, learning participation, and learning motivation, etc., and reject a single evaluation. The performance outside the classroom should also be included in the assessment comments. Teachers not only use the PBL teaching method to update students' knowledge, but also promote the comprehensiveness of teaching assessment, make their students' assessment results fairer and just, abandon the result evaluation and pay attention to process evaluation.

# 3. Implementation and effect of PBL teaching method in aerobics course

The aerobics course is mainly practical knowledge, and the traditional teaching method adopted by teachers - face-to-face teaching. When dealing with aerobics courses, they are no longer looking at the flower. From passive learning to active learning, the channels for students to acquire knowledge are not limited to classroom learning. To some extent, the shortcomings of teachers' teaching have been improved. Students Become the protagonist of learning in class.

#### 4. Conclusion

The introduction of the PBL teaching method in aerobics teaching is conducive to students' mastery and understanding of theoretical knowledge, solve the problems arising in the practice process with the knowledge they have learned, so as to achieve practical use. At the same time, learn from each other on the basis of teamwork to improve students' interest in learning and deal with unexpected problems. Really Students are the main body of learning. In practice, teachers explore methods suitable for aerobics teaching, summarize teaching experience, cultivate students to study independently, and teamwork to achieve the purpose of lifelong sports.

#### References

[1] Tang Y. Research on the Application of PBL Teaching Method in Nursing Teaching in Higher Vocational Colleges [J].

Modern Vocational Education, 2021(49):88-89.

- [2] Yang TT. Discussion on the application of PBL teaching method in higher vocational nursing teaching [J]. Science and technology style, 2019(19):41.
- [3] Liang QW, Liu JY. Preliminary exploration of using PBL combined with situational teaching in teacher education [J]. Journal of Qilu Normal University, 2018,33 (1): 47-51.
- [4] Wang HM, Zhang AN, Zeng XH. Preliminary Study on the Application of PBL Teaching Model Based on Microteaching Assistant in Medical Chemistry Teaching [J]. East Chemical, 2019, 46(23): 132-133.