

Application of PBL Teaching Method in Nursing Education in Higher Vocational Surgical Nursing

Lin Cheng

Trinity University of Asia, Quezon, Philippines
1172913103@qq.com

Abstract: This article explores the application of PBL teaching method in higher vocational surgical nursing. The document points out that PBL teaching method emphasizes students' active exploration and problem-solving, cultivating self-learning, critical thinking, and teamwork abilities. In higher vocational surgical nursing, PBL teaching method stimulates students' interest in learning and enhances their practical operation ability by setting real clinical situations and problems. The document elaborates in detail on the advantages, specific application steps, application effects, challenges, and countermeasures of PBL teaching method. Through PBL teaching method, high-quality surgical nursing talents can be cultivated, promoting teaching reform and innovative development. This teaching method is of great significance in improving the quality of nursing education.

Keywords: PBL teaching, Surgical nursing, higher vocational education

1. Background of PBL research in nursing

1.1. The urgent need for nursing education reform

With the continuous advancement of medical technology and the increasing diversity of patient needs, clinical nursing staff need to possess higher professional competence and comprehensive abilities. Traditional nursing teaching methods, such as lecture based teaching, often focus on imparting knowledge and neglect the cultivation of students' self-learning, problem-solving, and teamwork abilities.[1] This passive learning approach leads to students lacking practical experience and innovative thinking, making it difficult to meet the practical needs of modern nursing work. Therefore, nursing education urgently needs a teaching method that can enhance students' active learning, problem-solving, and teamwork abilities, and PBL teaching method has emerged.

1.2. Introduction and development of PBL teaching method

The PBL teaching method was first proposed by American neurology professor Barrows in 1969 at McMaster University in Canada. This teaching method is based on constructivist theory, advocating guiding students to solve practical problems in life, and cultivating students' abilities in problem-solving, information processing, collaboration, etc. [2] through learning methods such as independent information collection, screening, and group discussions to obtain results. Since its proposal, PBL teaching method has been widely applied globally, especially in the fields of medical and nursing education.

1.3. The advantages of PBL teaching method in nursing

The PBL teaching method emphasizes the process of students actively exploring and solving problems, enabling them to establish the habit and ability of self-directed learning. In clinical nursing teaching, students can gain a deeper understanding and application of professional knowledge through self-directed learning; The PBL teaching method emphasizes student group cooperation to solve problems, promotes cooperation and communication among students, and cultivates students' team spirit and collaboration ability. In clinical nursing teaching, teamwork is very important, and students can better cultivate their teamwork ability through PBL teaching method; The PBL teaching method focuses on cultivating students' problem-solving abilities, teaching them to analyze, reason, and solve practical problems through practical cases and problem situations. In clinical nursing teaching, students need to have strong problem-solving skills, and PBL teaching method can help them improve this ability.

1.4. The current application status of PBL teaching method in nursing

At present, the application of PBL teaching method in nursing education in China is still in its infancy, but it has achieved some significant results. Some universities have begun to apply PBL teaching method to nursing courses, by simulating real nursing scenarios, allowing students to learn and apply knowledge in the process of problem-solving, and improving their practical ability and comprehensive quality. Meanwhile, the PBL teaching method has also been widely applied in scenarios such as case analysis, problem solving, and teamwork, effectively enhancing students' interest and participation in learning.

1.5. Challenges and prospects of PBL teaching method in nursing

Although PBL teaching method has many advantages in nursing, it also faces some challenges. For example, PBL teaching requires significant time and effort investment, and for nursing teachers, more preparation work and guidance for students to participate in discussions are needed, which puts higher demands on the quality and ability of the teaching team. In addition, students also need to have certain self-learning and teamwork abilities, but in reality, many students lack these qualities and need to spend extra time and energy cultivating them.

However, with the continuous development and reform of nursing education, the application of PBL teaching method in nursing will gradually become popular and deepened. More and more nursing schools will adopt PBL teaching method as the main teaching method to cultivate students' self-learning ability, problem-solving ability, and teamwork spirit. Meanwhile, with the increasing demand and upgrading of nursing professionals in society, PBL teaching method will gradually become the mainstream of nursing education in China.

In summary, the research background of PBL teaching method in nursing is urgent, necessary, and has broad prospects. Through the application of PBL teaching method, we can cultivate more high-quality nursing talents with self-learning, problem-solving, and teamwork abilities, providing strong talent guarantee for modern nursing work.

2. PBL research methods in nursing

2.1. Core elements of PBL research methodology

The core of PBL teaching method lies in the design of problems. These questions are usually based on real clinical cases, aiming to simulate real nursing scenarios and stimulate students' thinking and exploration. The problem should be representative, typical, and able to cover a wide range of

knowledge points. At the same time, the difficulty should be moderate, neither too simple nor too complex, so that students can apply the knowledge they have learned to analyze and solve it; In the PBL teaching method, students need to engage in self-directed learning around problems, search for information through resources such as the internet and library, and explore the answers to problems. This process helps to cultivate students' self-learning ability and information retrieval ability; Students usually study and discuss in groups, jointly analyzing problems and proposing solutions. Group discussions help cultivate students' teamwork and communication skills, while also promoting ideological collisions and knowledge sharing among students; In the process of PBL teaching, teachers need to play the role of guides, helping students clarify problems, sort out ideas, and provide appropriate prompts and guidance when students encounter difficulties. At the same time, teachers also need to provide feedback and evaluation on students' discussions and solutions, pointing out their strengths and weaknesses, so that students can continuously improve and enhance themselves.

2.2. Application steps of PBL research method in nursing

Before implementing the PBL teaching method, teachers need to clarify teaching objectives, including knowledge objectives, ability objectives, and emotional attitude objectives. These goals will guide the design and implementation of the entire PBL teaching process.

Selecting clinical cases: Teachers select representative clinical cases as the basis for PBL teaching based on teaching objectives [3]. These cases should cover key knowledge and skill points in nursing, while also being closely related to clinical practice, so that students can better understand and apply the knowledge they have learned; Based on clinical cases, teachers design a series of questions that should guide students to gradually explore the knowledge and principles behind the cases. The design of problems should be hierarchical and progressive, so that students can learn and think step by step; Students learn and discuss in groups. In group discussions, students need to jointly analyze problems, propose hypotheses, develop solutions, and engage in communication and debate. This process helps cultivate students' critical thinking, teamwork, and communication skills; Based on group discussions, students need to develop specific nursing measures and implement them. During the implementation process, teachers need to pay attention to students' operational skills and nursing effectiveness, and provide timely feedback and guidance. At the same time, students also need to evaluate and summarize nursing measures in order to continuously improve and enhance them.

2.3. The advantages and challenges of PBL research method in nursing

The PBL teaching method can stimulate students' interest and initiative in learning, cultivate their ability to learn independently and solve problems. At the same time, through group discussions and collaboration, students can better understand and apply the knowledge they have learned, and improve their teamwork and communication skills [4]. In addition, the PBL teaching method also helps cultivate students' critical thinking and innovation abilities. However, the implementation of PBL teaching method requires a significant investment of time and resources, including case selection, problem design, organization of group discussions, and teacher guidance. At the same time, there is a high demand for students' self-learning ability and teamwork spirit, and some students may find it difficult to adapt to this learning style. In addition, the implementation of PBL teaching method also requires teachers' professional quality and continuous innovation and improvement of teaching methods.

In summary, the PBL research method has important application value in nursing, which can cultivate students' comprehensive abilities and improve their nursing practice level. However, in the implementation process, it is also necessary to pay attention to its challenges and shortcomings in order to continuously improve and optimize teaching methods.

3. Application of PBL teaching method in vocational college surgical nursing

3.1. The advantages of PBL teaching method

The PBL teaching method can attract students' attention, stimulate their learning interest and thirst for knowledge, and make them more actively participate in the learning process by setting real clinical situations and problems; In the PBL teaching mode, students need to independently search for information, analyze problems, and propose solutions, which helps cultivate their self-learning ability and lifelong learning habits; Through in-depth exploration and analysis of clinical issues, students can learn to examine problems from different perspectives, raise questions, and enhance their critical thinking skills [5]; Group discussion is an important component of PBL teaching method. Through teamwork, students can learn communication, coordination, and division of labor, enhancing their teamwork skills; The PBL teaching method emphasizes the application of theoretical knowledge to solve practical problems, which helps students better understand and master the theoretical knowledge of surgical nursing and enhance their practical operation ability.

3.2. The specific application of PBL teaching method in higher vocational surgical nursing

Teachers should choose representative surgical cases that cover common issues and technical difficulties in surgical nursing, while also possessing a certain level of complexity and difficulty to challenge students' knowledge and abilities.

Set problem scenarios: Based on the selected case, teachers should create a series of problem scenarios related to surgical nursing that can guide students to think, analyze, and discuss in depth, stimulate their learning interest and thirst for knowledge.

Group discussion and presentation: Divide students into several groups, and each group will discuss the set problem situation, form group opinions, and report to the whole class. During the discussion process, teachers should encourage students to actively speak up, provide insights, and guide them to explore and analyze problems in depth; During the discussion process, teachers should provide timely guidance and feedback to help students clarify their thinking and solve problems. At the same time, teachers should also pay attention to students' performance, give timely recognition and encouragement, and enhance their learning confidence and enthusiasm; Based on the results of the case discussion, teachers should arrange students to engage in relevant practical exercises, such as simulated surgical nursing, wound treatment, etc. In the process of practical operation, teachers should pay attention to students' mastery of operational skills and processes, and provide necessary guidance and correction. Finally, evaluate students' learning outcomes and practical skills through exams, assignments, classroom performance, and other methods.

3.3. The application effect of PBL teaching method in higher vocational surgical nursing

The PBL teaching method can enable students to have a deeper understanding and mastery of the theoretical knowledge of surgical nursing, while enhancing their practical and problem-solving abilities; Through the application of PBL teaching method, high-quality surgical nursing talents with self-learning, critical thinking, teamwork, and practical operation abilities can be cultivated.

Promoting teaching reform: The application of PBL teaching method can help promote the teaching reform of surgical nursing in higher vocational education, and promote the innovation and development of teaching methods and means [6].

3.4. Challenges and countermeasures faced

Although PBL teaching method has significant advantages in higher vocational surgical nursing, its application also faces some challenges, such as the teaching ability of teachers, the learning habits of students, and the limitations of teaching resources. To address these challenges, the following measures can be taken: enhancing teachers' teaching abilities and professional qualities, so that they can better adapt to the requirements of PBL teaching method. Guide students to transition from passive knowledge acquisition to active learning and thinking, and cultivate their ability for self-directed learning and critical thinking. Fully utilize teaching resources such as schools and hospitals to provide students with richer and more diverse learning resources and practical opportunities.

4. Conclusion

In summary, the PBL teaching method has significant advantages and importance in the application of surgical nursing in higher vocational education. By applying PBL teaching method reasonably, high-quality surgical nursing talents can be cultivated, promoting teaching reform and innovative development.

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