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# Innovation and Practice of the Concept of “Post-Course-Competition-Certificate” in Nursing Professional Experimental Teaching from the Perspective of Multidimensional Education Theory

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ABSTRACT

**[Objective]** From the perspective of multi - dimensional education theory, explore the situation of the concept of “Post-Course-Competition-Certificate” in nursing professional experimental teaching. **[Methods]** Through investigation and research, collect relevant data on the concept of “Post-Course-Competition-Certificate” in nursing major, including the understanding degree of the concept, the cognition of the role in nursing major learning, the cognition of the importance of each part, the participation degree, practical operation problems and overall satisfaction, etc. **[Results]** The survey found that the proportion of those who have a deep understanding of the concept of “Post-Course-Competition-Certificate” is low (very understanding 12.45%, relatively understanding 14.16%), and most are at the general level or below; most respondents recognize that this concept has a positive effect on nursing major learning, especially in improving practical ability (80.13% agree); post practice is considered the most important (accounting for 57.02%), but the participation degree in course learning is the highest (65.94%); insufficient practical opportunities (61.81%) and the disconnection between courses and practice (52.39%) are prominent problems in practical operations; on the whole, most respondents have a positive attitude towards this concept (very satisfied 28.82%, relatively satisfied 36.87%), but there are still a small number of dissatisfied people. **[Conclusion]** The concept of “Post-Course-Competition-Certificate” has important value in nursing major learning, but its popularization degree needs to be improved, and there are many problems in practical operations. When promoting this concept in nursing professional experimental teaching, existing problems should be solved and the needs of a small number of people should be paid attention to so as to improve the overall effect.

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## 1. Introduction

Experimental teaching in the nursing major plays a crucial role in the process of cultivating high - quality nursing talents. However, at present, the experimental teaching of the nursing major is facing multiple difficulties. The traditional experimental teaching mode tends to verify theoretical knowledge, resulting in a disconnection between teaching content and the actual needs of clinical posts. This phenomenon is particularly evident in basic nursing experimental courses. Students often just follow the established steps for operations and lack the ability to deal with complex clinical situations. Meanwhile, the lack of experimental teaching resources, such as the shortage of advanced medical equipment simulation devices, greatly limits students' practical opportunities. In addition, the single teaching evaluation system, which mainly relies on experimental reports and operational examinations, is difficult to comprehensively assess students' comprehensive abilities.

The emergence of the concept of "Post-Course-Competition-Certificate" has opened up new ways to solve these problems. Among them, 'Post' focuses on the connection between teaching and post tasks, 'Curriculum' is committed to constructing curriculum content that is compatible with post capabilities, 'Competition' helps to improve students' skills and innovation capabilities, and 'Certificate' can enhance students' employment competitiveness. Applying this concept to nursing professional experimental teaching is helpful to break through the constraints of the traditional teaching model, and then improve students' comprehensive qualities and professional adaptability.

This study, from the perspective of multi - dimensional education theory, deeply explores the innovation and practice of the "Post-Course-Competition-Certificate" concept in nursing professional experimental teaching. Specifically, based on theories such as cognitivism and constructivism, this study will analyze the methods of constructing new teaching models and explore how to integrate post tasks, course content, skill competitions and vocational qualification certificate requirements, so as to improve students' various abilities.

From the perspective of nursing education reform, at the theoretical level, the integration of multi-dimensional education theory and the concept of "Post-Course-Competition-Certificate" provides a brand - new theoretical framework for nursing education reform. Take the constructivist theory as an example. In the experimental teaching environment based on the concept of "Post-Course-Competition-Certificate", students can construct their own knowledge systems by actively partic-

ipating in post - task simulations, competition activities, etc., which opens up a new direction for the development of nursing education theory. At the practical level, this study can provide valuable experience for the experimental teaching reform of the nursing major and serve as an example for the teaching reform of the nursing major in other colleges and universities, thus promoting the development of nursing education in the direction of adapting to social needs and career development.

For students, in terms of improving practical ability, the experimental teaching under the concept of "Post-Course-Competition-Certificate" enables students to be exposed to more realistic clinical task situations. For example, tasks are set according to post standards in the simulated ward, and students can exercise their nursing operation skills in the process of completing the tasks. Moreover, skill competitions can stimulate students' sense of competition and prompt them to continuously improve their skill levels. In terms of improving professional quality, the emphasis of the "Post-Course-Competition-Certificate" concept on obtaining professional qualification certificates and connecting with post requirements is helpful to cultivate students' professional ethics and sense of responsibility, making students more clear about their career development directions and further enhancing their professional quality.

## 2. Overview of Multi-dimensional Education Theory

### 2.1 Constructivist Theory

The constructivist theory holds that knowledge is not acquired through teaching by teachers, but is obtained by learners in certain situations, with the help of others and by using necessary learning materials through the way of meaning construction. In the practice teaching of "Post-Course-Competition-Certificate" in the nursing major, the constructivist theory has important guidance and influence<sup>[1]</sup>. It emphasizes that students actively construct knowledge in the processes of post practice, course learning, competition, and obtaining professional qualification certificates. For example, during post practice, students do not passively accept the operation procedures, but actively think and adjust nursing measures according to the actual situation, and construct their own nursing knowledge systems in the situations of interacting with patients and dealing with practical problems. Course learning is no longer simply memorizing knowledge, but is carried out by connecting knowledge with actual nursing situations through case analysis, group discussion and other methods. In competitions, students continuously improve their

knowledge and skill structures by dealing with various challenging situations. The acquisition of professional qualification certificates also becomes the goal-driven force for students' self-knowledge construction and ability improvement. This theory promotes teaching to pay more attention to students' active participation and the situational construction of knowledge, and improves students' practical ability and comprehensive quality.

## 2.2 Situated Learning Theory

Situated learning theory emphasizes that learning should be carried out in real or simulated situations. Knowledge is situated and closely related to the activities, situations, and cultures in which it is applied<sup>[2]</sup>. In the practice teaching of "Post-Course-Competition-Certificate" in the nursing major, the situated learning theory has important guiding significance and influence. In terms of post practice, the working environments of nurses, such as wards and operating rooms, are natural learning situations. Students can directly observe and participate in nursing operations in these real - life situations, and deeply understand the connotations of nursing work. In course learning, by creating simulated clinical situations, such as conducting teaching in a simulated first-aid scene, students can combine theoretical knowledge with practical operations. For skill competitions, the competition scenes simulate high-pressure and high-requirement nursing situations, which prompt students to improve their skill levels in such situations. In terms of vocational qualification certification, the assessment contents are often based on actual nursing work situations, which prompt students to prepare knowledge and skills in corresponding situations. This theory is helpful to improve the practical ability and professional adaptability of nursing students.

## 2.3 Social Cognitive Theory

Social cognitive theory emphasizes elements such as observational learning, imitation, and self-efficacy. In the practice teaching of "Post-Course-Competition-Certificate" in the nursing major, this theory has a great deal of guidance and influence<sup>[3]</sup>. In post practice, novice nurses can learn and imitate by observing the operations and patient - communication methods of experienced nurses. For example, they can observe how to correctly perform venipuncture on patients, thereby improving their own skill levels. In terms of course learning, teachers serve as role models to demonstrate standard nursing operations and provide professional knowledge explanations, and students learn through observational imitation. In skill competitions, seeing the performances of other excellent

contestants can inspire students to imitate and learn their strategies and techniques. Meanwhile, when students achieve success in each stage, such as successfully completing a complex nursing task, their self-efficacy will be enhanced, prompting them to participate more actively in various activities of "Post-Course-Competition-Certificate". This helps to improve the learning motivation and practical ability of nursing students.

## 2.4 Cognitive Load Theory

Cognitive load theory focuses on information processing and cognitive load management during the learning process. In the practice teaching of "Post-Course-Competition-Certificate" in the nursing major, this theory has important guiding significance and influence<sup>[4]</sup>. The knowledge and skills in the nursing major are numerous and complex, such as the nursing points of various diseases and the procedures of different nursing operations. In post practice, nursing staff need to process a large amount of information quickly. If the cognitive load is too heavy, it may lead to operational errors. During course learning, teachers arrange teaching content reasonably according to cognitive load theory. For example, they break down complex nursing operations into multiple steps for step-by-step teaching, avoiding giving students too much information at once. For skill competitions, reasonable planning of competition content and processes and control of contestants' cognitive load are helpful for contestants to perform better. In terms of vocational qualification certification, the design of relevant examinations should also consider the cognitive load of candidates to ensure that their abilities can be accurately examined. This helps to improve the learning efficiency of nursing students and the accuracy of practical operations.

## 2.5 Theory of Multiple Intelligences

The Theory of Multiple Intelligences emphasizes the diversity of individual intelligences, including linguistic intelligence, logical-mathematical intelligence, spatial intelligence, bodily-kinesthetic intelligence, musical intelligence, interpersonal intelligence, intrapersonal intelligence, and naturalist intelligence, etc.<sup>[5]</sup>. In the practice teaching of "Post-Course-Competition-Certificate" in the nursing major, the Theory of Multiple Intelligences has unique guidance and influence. In post practice, interpersonal intelligence is helpful for nurses to communicate and cooperate effectively with patients, doctors, and other medical staff; bodily - kinesthetic intelligence is crucial for performing nursing operations such as injection and turning over patients. In course learning, logical-mathe-

mathematical intelligence can help students analyze patient data, and linguistic intelligence is beneficial for understanding and expounding nursing knowledge. In skill competitions, bodily-kinesthetic intelligence and spatial intelligence can play a role in the precision of operations and the arrangement of procedures. In terms of vocational qualification certification, multiple intelligences are comprehensively utilized to demonstrate comprehensive nursing abilities. This theory promotes teaching to focus on students' different intelligence advantages, realize personalized teaching, and improve teaching effectiveness.

### 3. Overview of the Concept of “Post-Course-Competition-Certificate”

#### 3.1 Post Practice

Post practice is an important component of the concept of “Post-Course-Competition-Certificate”. It emphasizes placing students in the actual working environment, enabling students to experience all aspects of nursing work personally in real-life nursing scenarios, such as hospital wards, operating rooms, and emergency rooms. During this process, students can directly face various needs of patients, including physiological nursing needs (such as wound care, drug administration, etc.) and psychological nursing needs (such as soothing patients' anxiety, etc.). Through practical operations and cooperation with the medical care team, students can develop solid practical abilities. For example, in the ward, students need to learn how to formulate personalized nursing plans according to patients' conditions and accurately carry out nursing operations. This kind of learning in the actual working environment can enable students to deeply understand the complexity and importance of nursing work and also improve their ability to solve practical problems.

#### 3.2 Course Learning

Course learning plays a role of connecting the preceding and the following in the concept of “Post-Course-Competition-Certificate”. It is not only the imparting of theoretical knowledge, but also a process of closely combining theoretical knowledge with practical operations. In the course learning of the nursing major, on the one hand, students need to study basic theoretical knowledge such as anatomy, physiology, and pathology, which provides a scientific basis for nursing practice. For example, understanding the physiological structure of the human body helps students to correctly perform injection operations and avoid damaging important tissues and organs. On the other hand, the curriculum includes a large number of practical courses, such as basic nursing experimental courses and clinical

nursing internships. In practical courses, students apply the theoretical knowledge they have learned to practical operations. For example, in basic nursing experimental courses, students practice various nursing operation skills, including making beds, catheterization, and nasal feeding. Through this course-learning method that combines theory and practice, students' comprehensive qualities are comprehensively improved, including professional knowledge level, practical operation ability, critical-thinking ability, and the ability to solve complex problems.

#### 3.3 Skill Competitions

Skill competitions are an important part of the “Post-Course-Competition-Certificate” concept. They provide a platform for students to display their skill levels and are also an effective way to enhance students' skill levels and self-confidence. In nursing-major skill competitions, the competition items usually cover key skills in nursing work, such as cardiopulmonary resuscitation (CPR), intravenous infusion, and nursing assessment. These competition items require students to complete various operation tasks within the specified time according to strict operation specifications. By participating in skill competitions, students can thoroughly study the operation key points of the competition items and continuously improve their operation speed and accuracy. For example, in a CPR competition, students need to be proficient in the depth and frequency of compressions and the correct method of artificial respiration, and be able to remain calm and operate accurately in the intense competition atmosphere. When students achieve good results in the competition or see their progress in the competition, their self-confidence will be greatly enhanced. This self-confidence will further motivate them to pursue higher goals in nursing study and practice.

#### 3.4 Vocational Qualification Certification

Vocational qualification certification is an important means to ensure that nursing students possess the necessary professional qualities. In the field of nursing, the vocational qualification certification examination usually consists of two parts: a theoretical examination and a practical operation examination. The theoretical examination covers knowledge in all aspects of the nursing major, such as basic nursing knowledge, clinical nursing knowledge, and nursing ethics, aiming to test students' mastery of the nursing knowledge system. The practical operation examination focuses on examining students' abilities in actual nursing operations, such as the standardization, safety of various nursing operations, and humanistic care



for patients. Through the vocational qualification certification examination, nursing talents with solid professional knowledge, proficient operation skills, and good professional qualities can be selected. This not only guarantees the professional standard of the nursing industry but also provides necessary qualification certificates for students to enter the nursing industry.

### 3. Research Methods

#### 3.1 Research Design

This research designs a questionnaire based on the constructivist theory, situated learning theory, social cognitive theory, cognitive load theory, and theory of multiple intelligences as the theoretical framework. These theories are of great significance in the field of educational research and can provide multiple perspectives for exploring issues related to nursing teaching.

The subjects of this study are sophomore, junior, and senior students majoring in nursing. The content of the questionnaire is designed from different theoretical perspectives: from the perspective of constructivist theory, it focuses on how students combine nursing theoretical knowledge with practice to construct a knowledge system; from the perspective of situated learning theory, it involves the role of practical scenario settings in nursing courses in knowledge acquisition and the influence of dif-

ferent internship environments on learning outcomes, etc.

The questionnaire covers all aspects of “Post-Course-Competition-Certificate”. In terms of ‘Post’, it investigates students’ understanding of the knowledge and skills required for nursing posts and the match between the curriculum and post requirements. In terms of ‘Curriculum’, it involves the rationality of curriculum design, such as the difficulty level and sequence arrangement of the content. In terms of ‘Competition’, it focuses on students’ participation in nursing competitions and the impact on the improvement of their knowledge and skills. In terms of ‘Certificate’, it investigates students’ attitudes towards obtaining nursing-related certificates, their preparation situations, and the influence of certificates on employment and career development.

This study aims to gain an in - depth understanding of the current situation and problems of the “Post-Course-Competition-Certificate” concept in nursing teaching from a multi-dimensional theoretical perspective through questionnaires, so as to provide a basis for subsequent research. A total of 800 questionnaires were distributed, and 775 were returned. The effective recovery rate is 96.875%. The relatively high effective recovery rate indicates that the questionnaire has high reliability and validity and can, to a certain extent, reflect the real situation of nursing students.

#### 3.2 Questionnaire and Related Theories (Table 1)

**Table 1.** Questionnaire and theoretical support

Serial Number	Questions and Options	Related Theories
1	<p>How well do you understand the concept of “Post-Course-Competition-Certificate”?</p> <p><input type="checkbox"/> Fully understand</p> <p><input type="checkbox"/> Relatively understand</p> <p><input type="checkbox"/> Generally understand</p> <p><input type="checkbox"/> Not quite understand</p> <p><input type="checkbox"/> Totally don't understand</p>	<p>① Cognitive Load Theory: Explore students’ initial cognition of the “Post-Course-Competition-Certificate” concept. Little cognition may indicate that the information has not been fully processed and has not entered long-term memory.</p> <p>② Theory of Multiple Intelligences: Students with different intelligence advantages have different ways and degrees of understanding the “Post-Course-Competition-Certificate” concept. For example, students with strong logical-mathematical intelligence are more likely to understand quantitative logical relationships, while students with strong interpersonal intelligence acquire knowledge through communication.</p>
2	<p>What do you think are the benefits of the “Post-Course-Competition-Certificate” concept for your nursing major study? (Multiple choices are allowed)</p> <p><input type="checkbox"/> Improve practical ability</p> <p><input type="checkbox"/> Enhance professional quality</p> <p><input type="checkbox"/> Increase learning interest</p> <p><input type="checkbox"/> Aid in career planning</p>	<p>① Constructivist theory: It emphasizes the active construction of knowledge. Students’ choices reflect different gains in constructing a nursing knowledge system based on “Post-Course-Competition-Certificate”. For example, those who choose to improve practical ability may construct an operational cognitive structure in practical situations.</p> <p>② Situated learning theory: “Post-Course-Competition-Certificate” provides a variety of learning situations, and students’ choices reflect their perception of learning outcomes in these situations, such as improving practical ability through post-practice.</p>

Serial Number	Questions and Options	Related Theories
3	<p>Which part do you think is the most important in the “Post-Course-Competition-Certificate” concept?</p> <p><input type="checkbox"/> Post - practice</p> <p><input type="checkbox"/> Curriculum study</p> <p><input type="checkbox"/> Skills competition</p> <p><input type="checkbox"/> Vocational qualification certification</p>	<p>① Social cognitive theory: Students’ judgment on the importance of each part of “Post-Course-Competition-Certificate” is influenced by observational learning and self-efficacy. For example, role models in post-practice or their own experiences may lead students to consider post-practice important.</p> <p>② Constructivist theory: Students construct their understanding of the importance of each part of “Post-Course-Competition-Certificate” according to their own learning experiences and goals. For example, some students attach more importance to curriculum study, while others focus more on vocational qualification certification.</p>
4	<p>What activities related to the “Post-Course-Competition-Certificate” concept have you participated in? (Multiple choices are allowed)</p> <p><input type="checkbox"/> Post - practice</p> <p><input type="checkbox"/> Curriculum study</p> <p><input type="checkbox"/> Skills competition</p> <p><input type="checkbox"/> Vocational qualification certification</p>	<p>① Situated learning theory: It emphasizes learning in specific situations. The question inquires about the participation in different situations of “Post-Course-Competition-Certificate”, which reflects the learning experience.</p> <p>② Constructivist theory: Learning constructs knowledge based on one’s own experience. Students’ activity choices reflect the differences in the paths of constructing a nursing knowledge and skills system.</p>
5	<p>What problems do you think exist in the actual implementation of the “Post-Course-Competition-Certificate” concept? (Multiple choices are allowed)</p> <p><input type="checkbox"/> Insufficient practical opportunities</p> <p><input type="checkbox"/> Disconnection between course content and practice</p> <p><input type="checkbox"/> Imperfect competition organization</p> <p><input type="checkbox"/> High difficulty in vocational qualification certification</p>	<p>① Constructivist theory: Students’ feedback on the practical operation problems of “Post-Course-Competition-Certificate” reflects their understanding of the limitations of the constructed concept, such as finding the constructive contradiction between the curriculum and practice.</p> <p>② Situated learning theory: Problems occur in different situations of “Post-Course-Competition-Certificate”, reflecting the influence of situational factors on learning, such as imperfect competition organization affecting the learning experience.</p>
6	<p>What is your overall satisfaction with the “Post-Course-Competition-Certificate” concept?</p> <p><input type="checkbox"/> Very satisfied</p> <p><input type="checkbox"/> Relatively satisfied</p> <p><input type="checkbox"/> Generally satisfied.</p> <p><input type="checkbox"/> Not very satisfied</p> <p><input type="checkbox"/> Very dissatisfied</p>	<p>① Social cognitive theory: Self-efficacy and outcome expectations influence students’ evaluation of their satisfaction with “Post-Course-Competition-Certificate” learning. A positive experience generally leads to higher satisfaction.</p> <p>② Constructivist theory: Students judge their satisfaction based on their own constructed learning experiences and gains from “Post-Course-Competition-Certificate”.</p>

## 4. Research Results

### 4.1 Analysis of the Cognition of the “Post-Course-Competition-Certificate” Concept in Nursing Specialty

#### 4.1 Degree of Understanding of the “Post-Course-Competition-Certificate” Concept

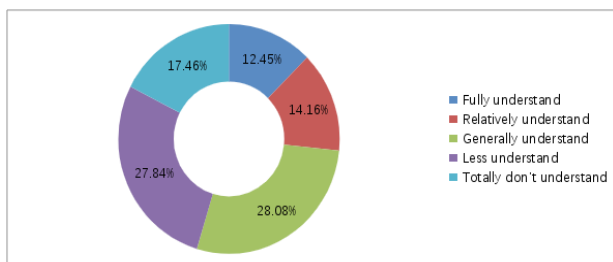


Figure 1. Degree of understanding of the concept of “Post-Course-Competition-Certificate”

Figure 1 shows the survey results regarding the under-

standing level of the “Post-Course-Competition-Certificate” concept. Only 12.45% of the respondents indicated that they knew the concept very well, 14.16% said they knew it relatively well, 28.08% had a general understanding, while the proportion of those who knew it less well reached 27.84%, and those who had no understanding at all accounted for 17.46%. This result indicates that among the surveyed group, the proportion of people with in-depth understanding (very well and relatively well) of the “Post-Course-Competition-Certificate” concept is relatively low, and most people’s understanding of this concept is at the general level or below, reflecting that the popularity of this concept in this group still needs to be improved.

#### 4.2 The help of the “Post-Course-Competition-Certificate” concept to nursing professional learning

Figure 2 shows that most of the respondents recognize that this concept has multiple positive effects on nurs-

ing professional learning. Among them, 80.13% of the respondents think that it is helpful to improve practical ability, 74.97% believe that it can enhance professional quality, 69.68% feel that it can increase learning interest, and 69.94% indicate that it is helpful for career planning. This indicates that the “Post-Course-Competition-Certificate” concept is widely regarded as having important value in nursing professional learning, especially in terms of improving practical ability, which has been recognized by a higher proportion of respondents.

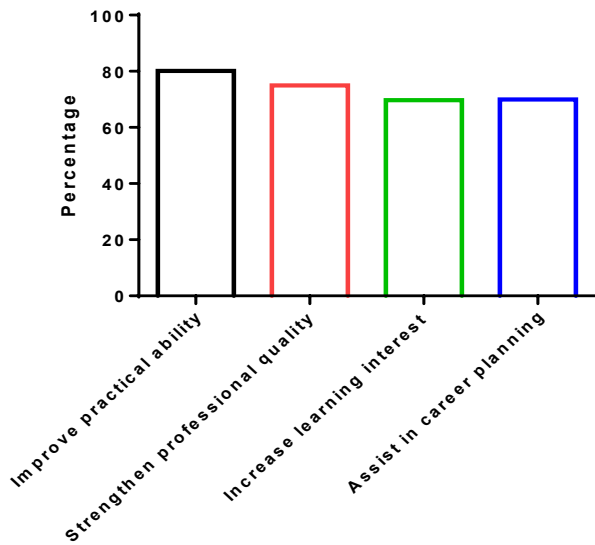


Figure 2. The help of the concept of “Post-Course-Competition-Certificate” to nursing major study

### 4.3 The Most Important Part of the “Post-Course-Competition-Certificate” Concept

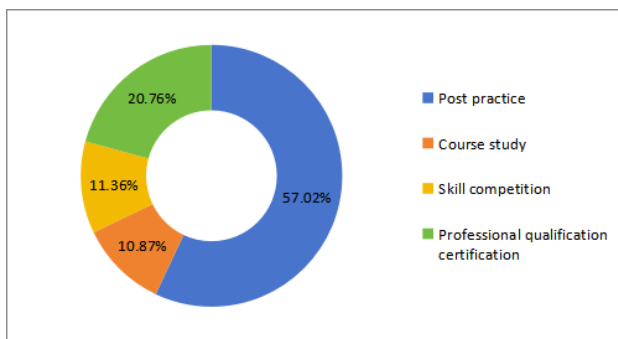


Figure 3. The most important part in the concept of “Post-Course-Competition-Certificate”

Figure 3 shows that post practice is considered the most important part, accounting for 57.02%, while the

proportions of curriculum learning, skill competition and vocational qualification certification are 10.87%, 11.36% and 20.76% respectively. This indicates that in the respondents’ perception, post practice occupies a dominant position in the “Post-Course-Competition-Certificate” concept, while curriculum learning is relatively considered to be of lower importance, and the importance of skill competition and vocational qualification certification lies between post practice and curriculum learning.

### 4.4 The Importance of Each Part of the “Post-Course-Competition-Certificate” Concept

Figure 4 shows that the participation rate of curriculum learning is the highest, reaching 65.94%; the participation rate of post practice is 58.45%; and the participation rates of skill competition and vocational qualification certification are 46.58% and 46.32% respectively. This result indicates that among the respondents, curriculum learning is the related activity with the highest participation rate, while the participation rates of skill competition and vocational qualification certification are relatively low and relatively close, and the participation rate of post practice is at an intermediate level.

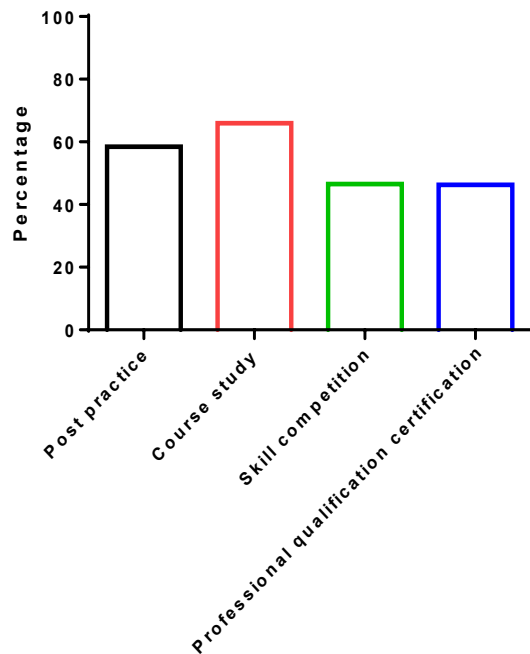
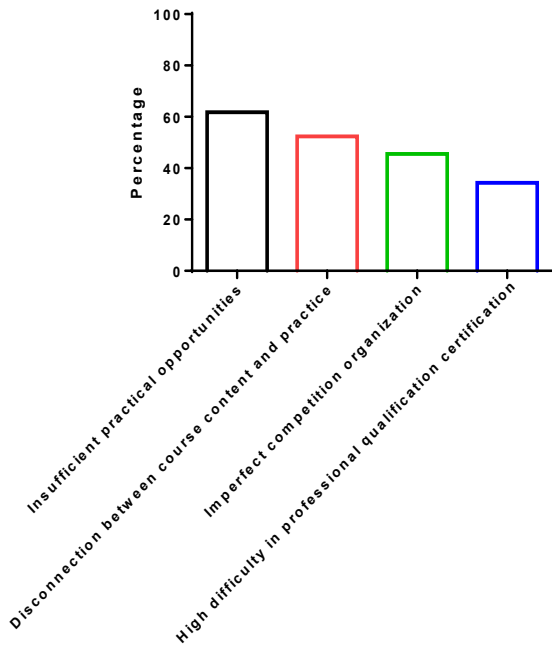


Figure 4. Activities related to the concept of “Post-Course-Competition-Certificate” that have been participated in

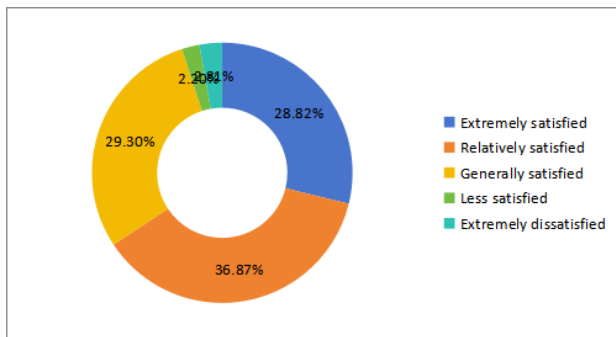
#### 4.5 Problems Existing in the Practical Operation of the “Post-Course-Competition-Certificate” Concept



**Figure 5.** Problems existing in the practical implementation of the “Post-Course-Competition-Certificate” concept

Figure 4 shows that the participation rate of curriculum learning is the highest, reaching 65.94%; the participation rate of post practice is 58.45%; and the participation rates of skill competition and vocational qualification certification are 46.58% and 46.32% respectively. This result indicates that among the respondents, curriculum learning is the related activity with the highest participation rate, while the participation rates of skill competition and vocational qualification certification are relatively low and relatively close, and the participation rate of post practice is at an intermediate level.

#### 4.5 Problems Existing in the Practical Operation of the “Post-Course-Competition-Certificate” Concept



**Figure 6.** Overall satisfaction with the “Post-Course-Competition-Certificate” concept

Figure 6 shows that the proportion of those who are very satisfied is 28.82%, and the proportion of those who are relatively satisfied is 36.87%. The sum of the two reaches 65.69%. The proportion of those who are generally satisfied is 29.30%. However, the proportions of those who are less satisfied and very dissatisfied are relatively low, accounting for 2.20% and 2.81% respectively. This result indicates that, on the whole, most of the respondents hold a positive attitude towards the “Post-Course-Competition-Certificate” concept, but there are still a small number of respondents who are somewhat dissatisfied.

### 5. Discussion

After analyzing a number of survey results related to the “Post-Course-Competition-Certificate” concept in this study, some points worthy of in - depth discussion were found. In terms of the understanding level of this concept, most of the respondents are at the general level or below. This means that the promotion efforts of this concept need to be strengthened. After all, only when more people understand it in-depth can its implementation be comprehensively promoted. In terms of nursing professional learning, this concept is widely recognized as having multiple positive meanings, among which the improvement of practical ability is more recognized, which echoes the important position of post practice in the concept and highlights the crucial value of practice in the nursing specialty. However, although post practice is regarded as the most important part, its participation rate is lower than that of curriculum learning, which may imply that there are limiting factors in the actual education or work arrangements, thus affecting the development of post practice. From the perspective of practical operation, the insufficient practical opportunities and the disconnection between the course content and practice are relatively significant problems. These not only hinder the effective implementation of this concept but may also be the reasons for some people’s insufficient understanding of it. Meanwhile, the imperfect competition organization and the high difficulty of vocational qualification certification also pose certain obstacles to the promotion of this concept. Finally, from the perspective of overall satisfaction, although most respondents hold a positive attitude, there are still a small number of people who are dissatisfied. This requires us to pay attention to the needs of this part of people. By taking measures such as increasing practical opportunities, improving the connection between the curriculum and practice, perfecting the competition organization, and reasonably adjusting the difficulty of vocational qualification certification, we can further optimize the implementation of the “Post-Course-Competition-Certificate” concept in



all aspects, thereby improving the overall satisfaction and better realizing the value of this concept in the nursing specialty.

## 6. Conclusion

The survey results of the “Post-Course-Competition-Certificate” concept in this study show that: the overall understanding level of this concept among the surveyed group is relatively low, and the proportion of those with in-depth understanding is limited, which means that the popularization work still needs to be strengthened. Most of the respondents recognize that this concept has multiple positive significance for nursing professional learning, especially in terms of improving practical ability, which is in line with the dominant position of post practice in the concept. However, in actual participation, the participation rate of curriculum learning is the highest, post practice is at an intermediate level, and the participation rates of skill competition and vocational qualification certification are relatively low and similar. At the practical operation level, the insufficient practical opportunities and the disconnection between the curriculum and practice are relatively serious problems, and there are also certain obstacles in competition organization and vocational qualification certification. In terms of overall satisfaction, most respondents hold a positive attitude, but there are still a small number of dissatisfied ones. Therefore, when further promoting this concept, it is necessary to strengthen publicity to improve the popularity, solve the problems in practical operation, and pay attention to the needs of a small number of people, so as to optimize the implementation effect of the “Post-Course-Competition-Certificate” concept.

## Funding Projects

1. Qingdao Binhai University Key Teaching Reform Research Project, “Innovative Strategies for Applied Nursing Specialty Experimental Teaching Driven by the Concept of “Post-Course-Competition-Certificate” (2024JZ10)”

2. Shandong Province Undergraduate Teaching Reform Research Project, “Innovative Research and Practice of

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3. Key Project of the China Higher Education Society, “Research on the Career Development Paths and Influencing Factors of Teachers in Private Applied Undergraduate Institutions” (23PXZ0203)

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