

Learning Achievement and Attitude toward Surgical Nursing Learning between
Experiential Teaching and Traditional Teaching for Vocational College of Health
Rehabilitation in Sichuan Province, China

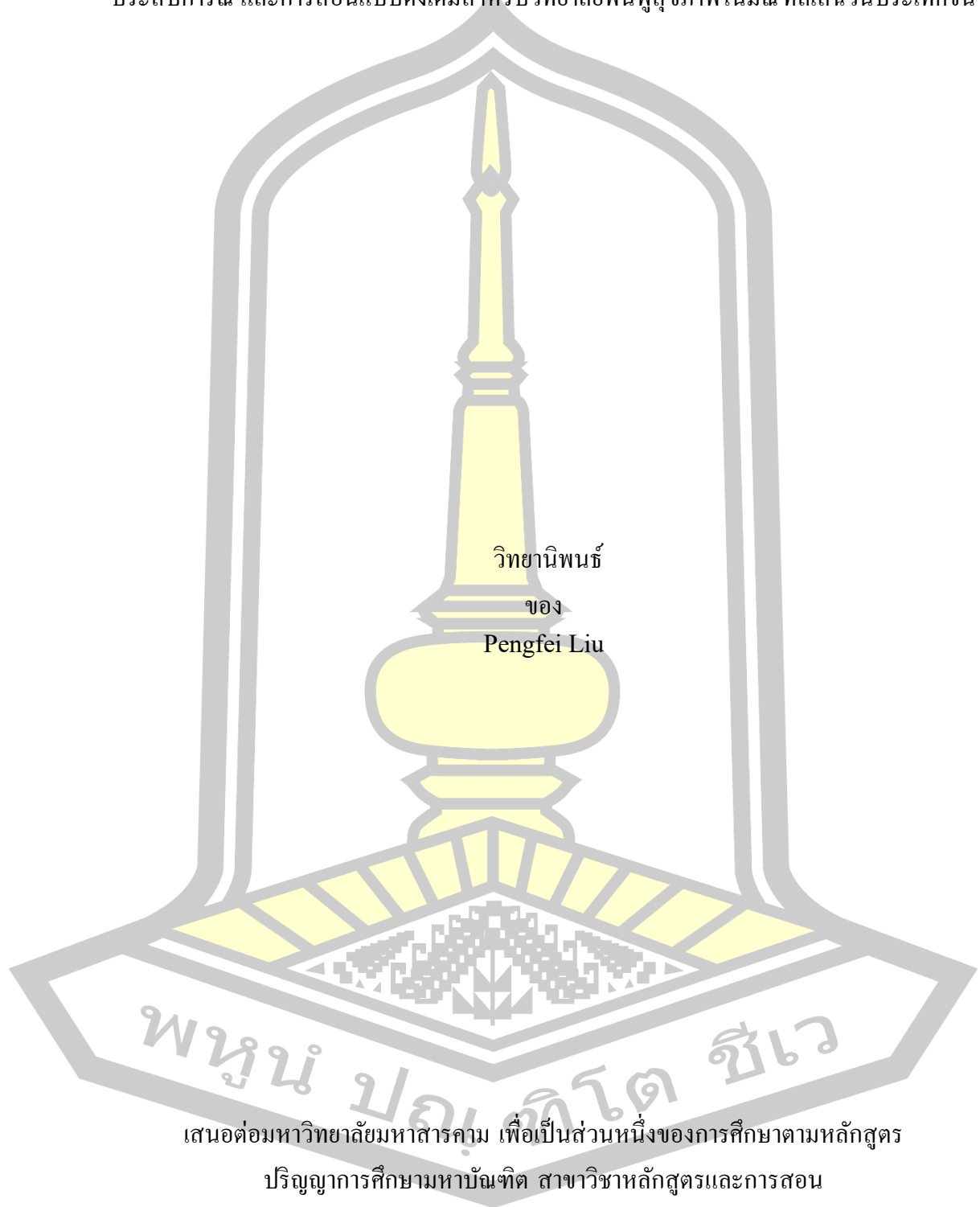
Pengfei Liu

A Thesis Submitted in Partial Fulfillment of Requirements for
degree of Master of Education in Curriculum and Instruction

November 2024

Copyright of Mahasarakham University

ความสำเร็จ และทัศนคติ ที่มีต่อการเรียนรู้ทางการแพทย์ศัลยกรรมระหว่างการสอนเชิง
ประสบการณ์ และการสอนแบบดั้งเดิมสำหรับวิทยาลัยฟื้นฟูสุขภาพในมณฑลเสฉวนประเทศจีน



เสนอต่อมหาวิทยาลัยมหาสารคาม เพื่อเป็นส่วนหนึ่งของการศึกษาตามหลักสูตร
ปริญญาการศึกษามหาบัณฑิต สาขาวิชาหลักสูตรและการสอน

พฤษภาคม 2567

ลิขสิทธิ์เป็นของมหาวิทยาลัยมหาสารคาม

Learning Achievement and Attitude toward Surgical Nursing Learning between
Experiential Teaching and Traditional Teaching for Vocational College of Health
Rehabilitation in Sichuan Province, China

Pengfei Liu

A Thesis Submitted in Partial Fulfillment of Requirements
for Master of Education (Curriculum and Instruction)

November 2024

Copyright of Mahasarakham University



The examining committee has unanimously approved this Thesis, submitted by Mr. Pengfei Liu , as a partial fulfillment of the requirements for the Master of Education Curriculum and Instruction at Mahasarakham University

Examining Committee

Chairman

(Asst. Prof. Sampan
Thinwiangthong , Ph.D.)

Advisor

(Asst. Prof. Kanyarat Sonsupap ,
Ph.D.)

Committee

(Assoc. Prof. Chowwalit
Chookhampaeng , Ed.D.)

Committee

(Asst. Prof. Apiradee Jansaeng ,
Ph.D.)

Mahasarakham University has granted approval to accept this Thesis as a partial fulfillment of the requirements for the Master of Education Curriculum and Instruction

(Assoc. Prof. Chowwalit
Chookhampaeng , Ed.D.)
Dean of The Faculty of Education

(Assoc. Prof. Krit Chaimoon , Ph.D.)
Dean of Graduate School

พหุบัณฑิต ชีวะ

TITLE	Learning Achievement and Attitude toward Surgical Nursing Learning between Experiential Teaching and Traditional Teaching for Vocational College of Health Rehabilitation in Sichuan Province, China		
AUTHOR	Pengfei Liu		
ADVISORS	Assistant Professor Kanyarat Sonsupap , Ph.D.		
DEGREE	Master of Education	MAJOR	Curriculum and Instruction
UNIVERSITY	Maharakham University	YEAR	2024

ABSTRACT

China's higher vocational nursing education continues to evolve. Traditional teaching methods, primarily based on classroom lectures, often struggle to achieve high-quality educational outcomes. Nowadays, clinical nursing has an increasing demand for all aspects of higher vocational nursing students. "Surgical Nursing" is a mandatory course for nursing students and constitutes a key component of the nurse professional qualification examination. To address these challenges, experiential teaching has been introduced as an innovative pedagogical approach.

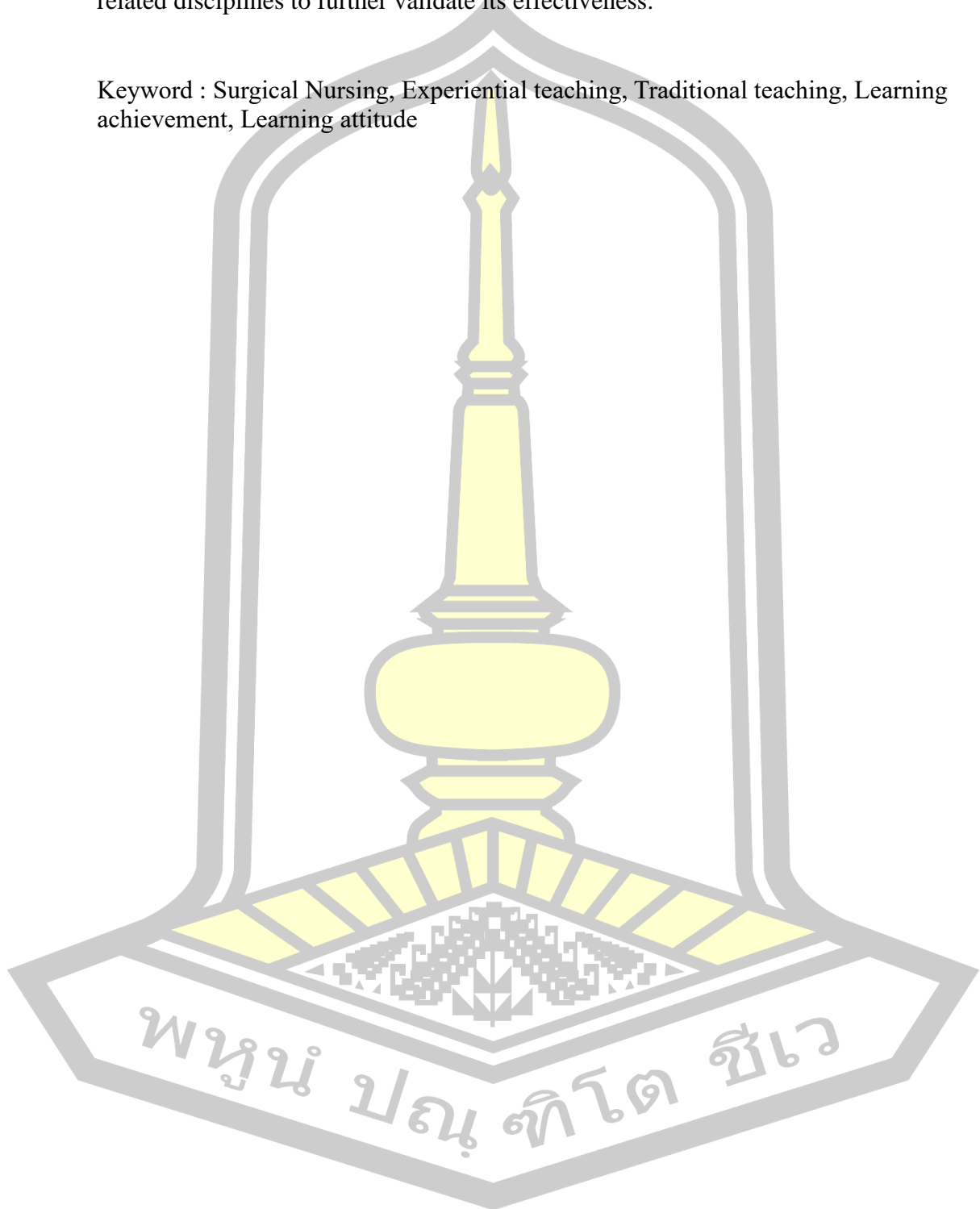
Therefore, this study aimed to

- 1)To compare the surgical nursing learning achievement of students between using experiential teaching and traditional teaching methods.
- 2)To compare the surgical nursing learning attitude of students between using experiential teaching and traditional teaching methods.

This design of this research was comparative experimental research, which used the experimental group (experiential teaching method) and the control group (traditional teaching method) to compare learning achievements and learning attitudes analysis. The sample comprised 46 students in the experimental group and 46 in the control group from 19 higher vocational nursing for Sichuan vocational college of health and rehabilitation in Sichuan province, China. Participants were selected using a cluster random sampling technique. Teaching plans, achievement tests related to learning outcomes, and questionnaires assessing learning attitudes were utilized throughout this study. Data analysis was conducted using paired-sample t-tests and independent sample t-tests (i.e., the p value, arithmetic mean, standard deviation). Results indicated that the experiential teaching method significantly enhanced both student achievement and attitudes toward surgical nursing when compared with traditional teaching method. Based on these findings, researchers recommend that educators incorporate

experiential teaching methodologies into their curricula for nursing courses. Furthermore, future studies should consider extending this approach to other medical-related disciplines to further validate its effectiveness.

Keyword : Surgical Nursing, Experiential teaching, Traditional teaching, Learning achievement, Learning attitude



ACKNOWLEDGEMENTS

This paper would not have been possible without the help of many people. First, I would like to thank several individuals who provided support and guidance in completing the requirements of my master's program and completing this thesis research. First, I would like to especially thank my professional mentor, Assistant Professor (Dr. kanyarat sonsupap), for sharing her rich knowledge and professional skills in curriculum and teaching, as well as her deep passion for the field of education. Second, I would like to thank the committee members, Chair Professor (Dr. Sampan Thinwinangthong) and (dean of the faculty of education.Dr. Chowwalit Chookhampaeng) and (Dr. Apiradee JansaengSujaree), for their valuable advice and support in the process of completing this process. Third, I would like to thank five experts from the college of Nursing of Sichuan Vocational College of Health and Rehabilitation : Professor Zou Jinmei, Professor Cai Li, Professor Pan Yan, Professor Xu Ling, and Professor Liu Jiamei, who helped check the curriculum plan, learning achievement test questions and learning attitude Questionnaire quality. Finally, I would like to thank my wife, Ms. Yang Xiaojiao. I would not have been able to complete this process without the love and patience of my wife and our children, who constantly gave me strength and confidence throughout the master's program.

Pengfei Liu

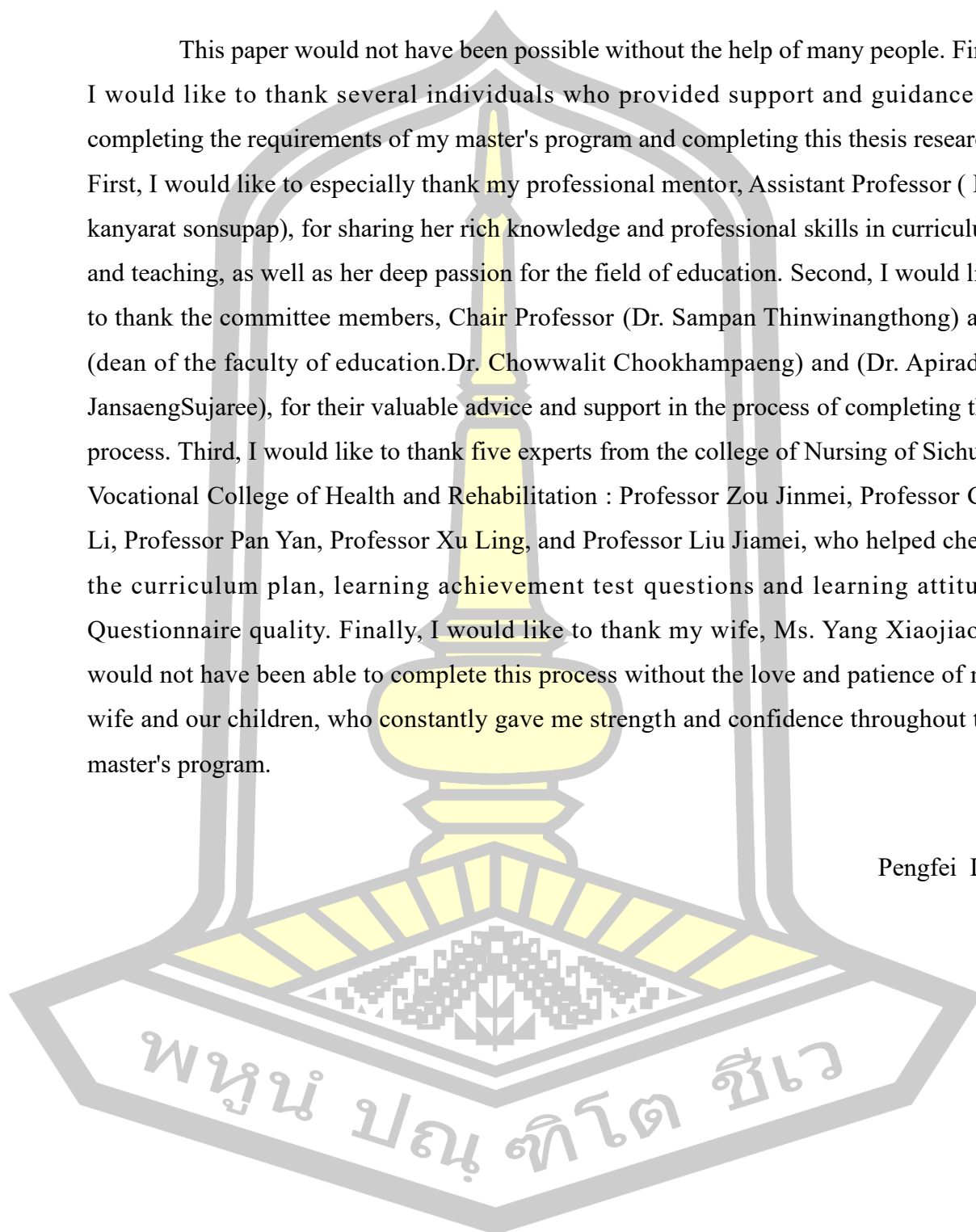
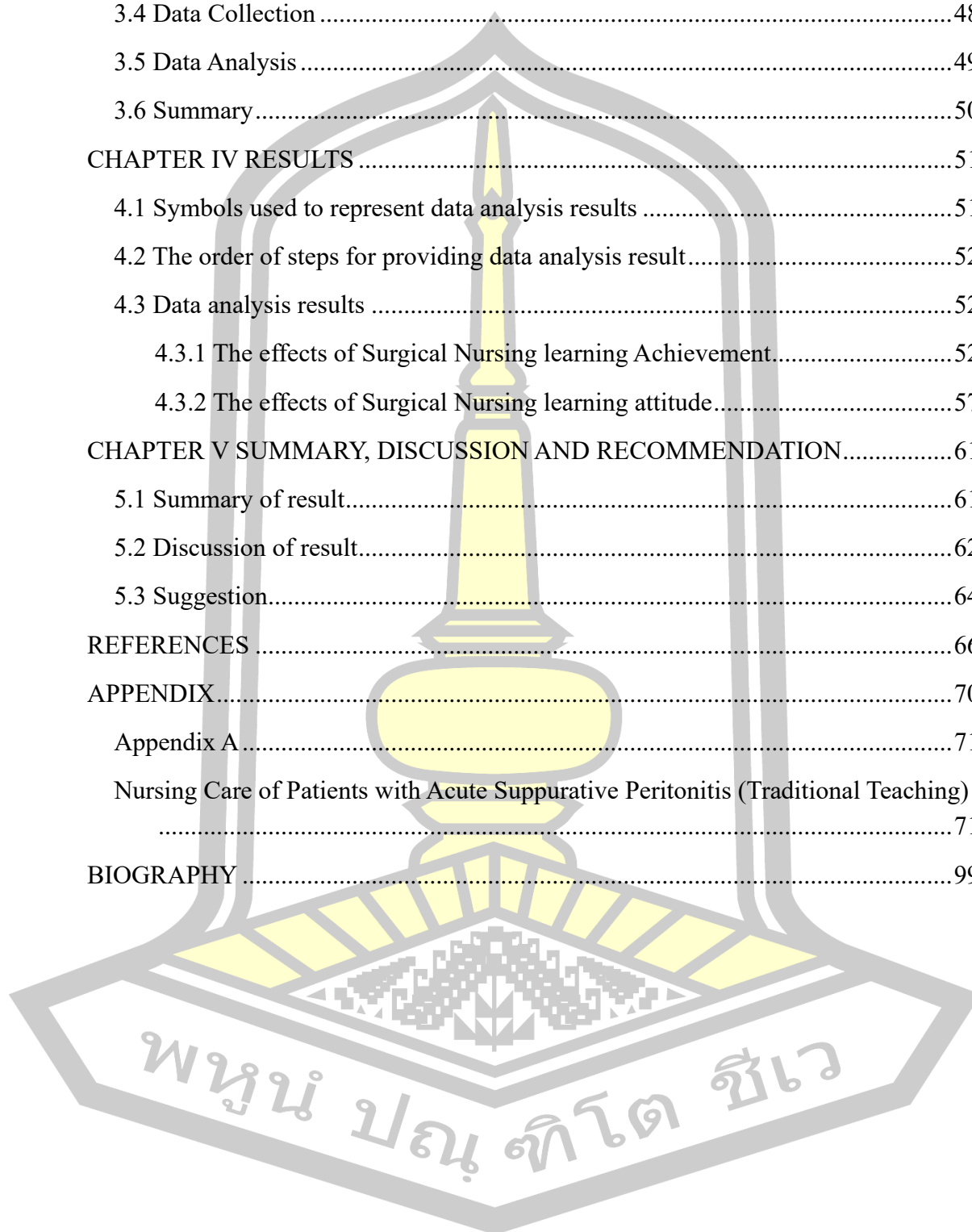


TABLE OF CONTENTS

	Page
ABSTRACT.....	D
ACKNOWLEDGEMENTS.....	F
TABLE OF CONTENTS.....	G
LIST OF TABLES	I
LIST OF FIGURES	J
CHAPTER I INTRODUCTION.....	1
1.1 Background.....	1
1.2 Purpose of the Research.....	2
1.3 Hypothesis of the Research	3
1.4 Scope of the Research.....	3
1.5 Definition:	3
CHAPTER II LITERATURE REVIEW AND CONCEPTUAL FRAMEWORK	9
2.1 Surgical Nursing	10
2.2 Experiential teaching and methods and Traditional teaching methods	11
2.2.1 Relevant theories of experiential teaching methods.....	11
2.2.2 Relevant theories of traditional teaching methods	20
2.3 Learning achievement.....	23
2.4 Learning Attitude.....	24
2.5 Literature review.....	25
2.5.1 Domestic research status:.....	25
2.5.2 Foreign research status:.....	27
2.6 Conceptual framework.....	28
CHAPTER III RESEARCH METHODS	30
3.1 Population and Sampling.....	30
3.2 Research Designs:	31

3.3 Research and Constructive Instruments.....	39
3.4 Data Collection	48
3.5 Data Analysis	49
3.6 Summary.....	50
CHAPTER IV RESULTS	51
4.1 Symbols used to represent data analysis results	51
4.2 The order of steps for providing data analysis result.....	52
4.3 Data analysis results	52
4.3.1 The effects of Surgical Nursing learning Achievement.....	52
4.3.2 The effects of Surgical Nursing learning attitude.....	57
CHAPTER V SUMMARY, DISCUSSION AND RECOMMENDATION.....	61
5.1 Summary of result.....	61
5.2 Discussion of result.....	62
5.3 Suggestion.....	64
REFERENCES	66
APPENDIX.....	70
Appendix A.....	71
Nursing Care of Patients with Acute Suppurative Peritonitis (Traditional Teaching)	
.....	71
BIOGRAPHY	99

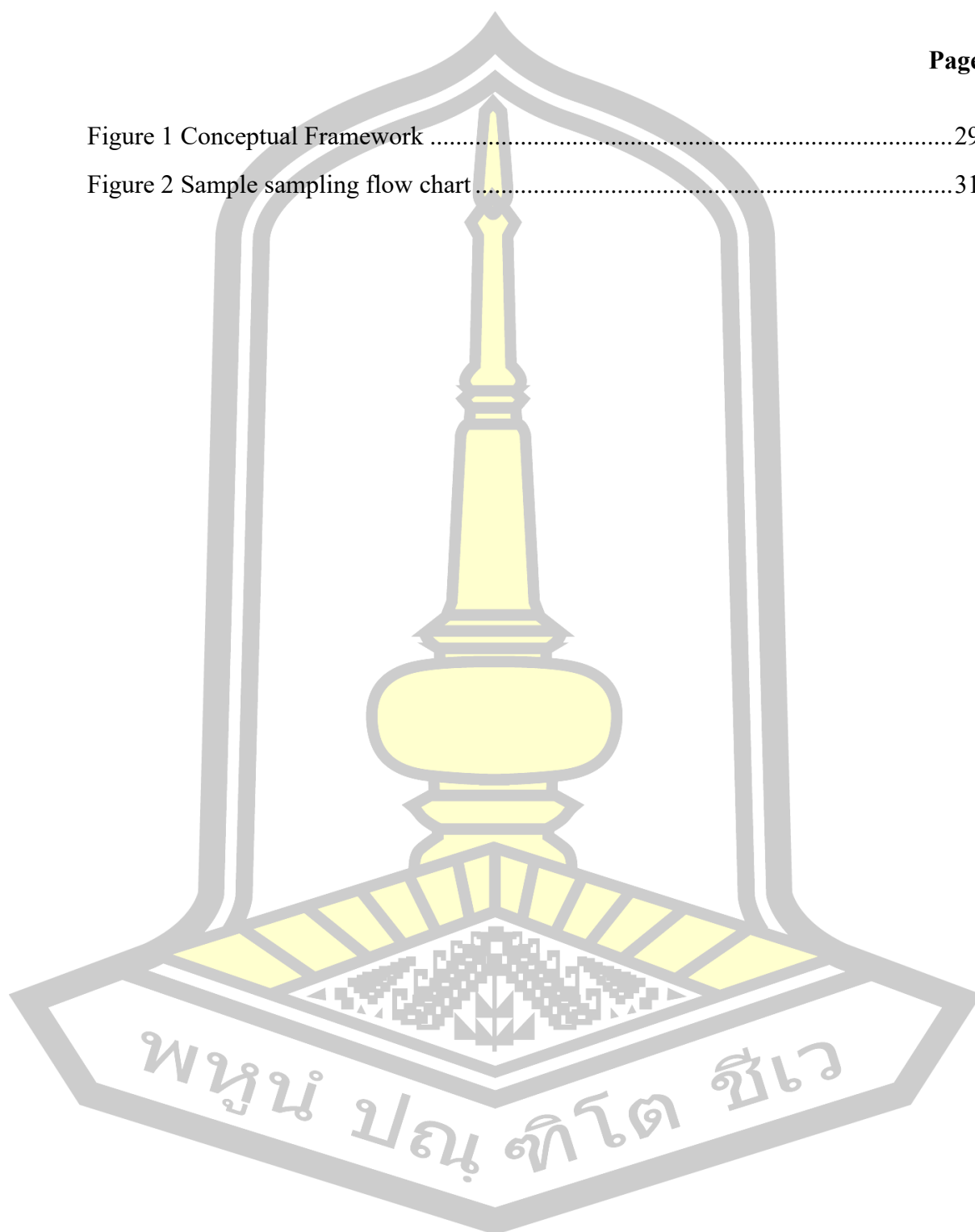


LIST OF TABLES

	Page
Table 1 Six steps of experiential teaching implementation	15
Table 2 General design sheet using traditional teaching method.....	33
Table 3 Six steps of experiential teaching implementation	36
Table 4 General design sheet using experiential teaching method	37
Table 5 Pre-test examination paper screening	41
Table 6 Post-test examination paper screening	42
Table 7 Experts 'evaluation scale for test examination paper of quality	42
Table 8 Experts' evaluation scale for teaching plans	43
Table 9 Classification of questionnaire content	45
Table 10 IOC Result of the learning achievement questionnaire	47
Table 11 Normal distribution test results of knowledge scores for Method 1 (traditional teaching method) and (experiential teaching method)	53
Table 12 Teaching method - (experiential teaching (experimental group)) surgical nursing performance after learning and traditional teaching (control group)) results of comparison using independent sample t-test	54
Table 13 Traditional teaching method paired sample statistical table	55
Table 14 Traditional teaching method paired samples t test	55
Table 15 Experiential teaching method paired sample statistical table	56
Table 16 Traditional teaching method paired samples t test	56
Table 17 Normal distribution test of each dimension of learning attitude scale.....	58
Table 18 Mann-Whitney Test-ranks of various dimensions of learning attitude.....	59
Table 19 Test Statistics of various dimensions of learning attitude	60

LIST OF FIGURES

	Page
Figure 1 Conceptual Framework	29
Figure 2 Sample sampling flow chart.....	31



CHAPTER I

INTRODUCTION

1.1 Background

In the five-year higher vocational nursing education in China's higher medical vocational education, students need to go through the first three years of secondary vocational education before they can learn the college professional courses. Five-year higher vocational nursing students in "surgical nursing" this course of study aged between 18 to 20 years old, female ratio is high, most of the students personality and lively, active thinking, but attention, self-control, initiative is a bit poor, easy to be irrelevant information interference, basic specialized knowledge is weak, and medicine. They are not interested in traditional theoretical courses, and like to use mobile phones, computers and other networks to obtain information, but they are easy to be disturbed by irrelevant information, and their discrimination is insufficient. Therefore, in the process of traditional teaching, fewer students can take the initiative to study and implement it, and more students are distracted in class, and they mainly walk and play with their mobile phones. At the same time they feel medical curriculum content more, boring, curriculum content, did not understand, can't understand, combined with the traditional teaching method of teachers is not enough to attract people, less chance for themselves, to experience the real clinical situation, feel the real clinical surgical nursing process, thus appeared the following two questions about learning achievement and learning attitude.

First, under the traditional teaching method, Student's learning achievements are poor, especially in the theoretical knowledge after learning is not good, they can not understand the etiology, pathophysiology, clinical manifestations, nursing diagnosis, nursing measures and other aspects of common diseases in surgical nursing, and their theoretical examination learning achievement are not ideal.

Second, under the traditional teaching method, Student's learning attitude is not good, which is reflected in three aspects of cognitive level, emotional experience and behavioral tendency. Such as: learning the desire is not enough, not independent

learning ability, self-management ability is poorer, difficult then retreated, learning enthusiasm is not high, professor against the traditional teaching.

Therefore, in the daily teaching process, it is necessary to carry out practical and sufficient teaching around the clinical and related professional courses, and highlight the teaching key points.(Liu Xian jun,2012), centering on the students interest in learning atmosphere, based on constructivism and the effective utilization of bruner found, cognitive theory, flexible application of a variety of teaching methods, arouse the enthusiasm of Student's active learning, improve Student's autonomous learning ability(Zhang li ying,2014). In this context, there is an urgent need to find a teaching method that can directly and fully mobilize Student's active learning to replace Student's passive learning.

Experiential teaching is a teaching method dominated by Student's experience. Students gain experience by fully participating in activities, and then share their experience thoughts under the guidance of teachers, so as to understand the teaching content in practical activities. The focus of experiential teaching is the process of teachers creating learning situations, allowing students to experience, touch and feel, guiding students to enter the feeling state, stimulating Student's inner emotions, and enabling students to be fully developed (Lu ye, 2021). In this learning process, students can well understand and master knowledge. Student's learning attitude (cognitive level, emotional experience and behavioral tendency) can be effectively improved. Therefore, experiential teaching has become one of the best choices. It is expected that under this teaching method, compared with the traditional teaching method, Student's learning achievement can be improved and their learning attitude can be improved.

1.2 Purpose of the Research

To compare the surgical nursing learning achievement of students between using experiential teaching and traditional teaching methods for vocational college of health and rehabilitation in Si Chuan province, China

To compare the surgical nursing learning attitude of students between using experiential teaching and traditional teaching methods for vocational college of health and rehabilitation in Si Chuan province, China

1.3 Hypothesis of the Research

H1: Learning attitude: Students who used the experiential teaching method has better learning achievements better than those in the control group

H2: Learning attitude: students who used the experiential teaching method have better learning attitude better than those in the control group

1.4 Scope of the Research

1.4.1 Population :

The population choose is from vocational college of health and rehabilitation in Si Chuan province, China. total number 184 students, the 19 higher vocational nursing 4 classes (Sophomore year of college)

1.4.2 Sampling :

46 students from classes 5 and 46 students from classes 6 of 19 higher vocational nursing for vocational college of health and rehabilitation in Sichuan province, China

1.4.3 Variable to study :

Independent Variable : Experiential teaching. Traditional teaching

Dependent variable : Learning achievement. Learning attitude

1.4.4 Duration Time :

In the teaching of surgical nursing courses offered by the vocational college of health rehabilitation in Si Chuan province, China. a unit of content "Nursing Care of Patients with General Surgery Diseases" was selected for teaching, and a 2-month experiment was conducted, with two classes per week, totaling 16 classes. (May 24 - July 23, 2024)

1.5 Definition:

1.5.1 Surgical nursing

Surgical nursing is an important component of nursing. It is a clinical nursing course that elaborates and studies the holistic care of surgical patients. It is a

compulsory core course for nursing students, including the professional knowledge and skills required for nursing positions. It is also a key content of the nurse qualification exam. Surgical nursing focuses on surgical patients with trauma, infection, tumors, deformities, obstruction, stones, and functional impairments, and its scope is guided by modern medical models and nursing concepts. Through the overall learning of this course, we can collaborate with other medical workers in wards and operating rooms to provide holistic care for various surgical patients based on their physical and mental health needs, social and family cultural needs, and with human health as the center, applying nursing programs to provide patients with holistic care.

1.5.2 Traditional Teaching :

The traditional teaching mode refers to the teaching mode in which the teacher explains on the blackboard on the platform, supplemented by blackboard writing, and the students listen and practice on the seats. Its main activity is that the teacher explains the content of the textbook to the whole class in order according to the teaching progress. The students can become proficient in the textbook and the knowledge taught by the teacher through listening attentively in class, practicing and reviewing after class. If necessary, the teacher can supplement many textbooks or add many practice opportunities through examinations.

Traditional teaching is characterized by "transmission acceptance", which has the following characteristics:

- (1) Teachers are the transmitter of knowledge and the masters of the whole teaching process.
- (2) Students are the objects of imparting knowledge and passive recipients of external stimuli.
- (3) Textbooks are the only learning content for students and the main source of Student's knowledge.

Traditional Teaching Steps :

Step1 : Determine teaching objectives

Step2 : Teachers impart knowledge

Step3 : Student participation in classroom activities

Step4 : Summary and induction

Step5 : Assigning homework after class

1.5.3 Experiential teaching

Experiential teaching is a way for students to actively engage in exploring issues they find meaningful. This teaching method is emotional learning, because students often have little interest in knowledge that is separate from their experience. Experiential teaching combines meaningful direct experience with teacher-led reflection and analysis, a challenging, positive, student-centered process that gives students the opportunity to take proactive and responsible decisions. Experiential teaching allows students countless opportunities to connect body with mind and soul, and the experiential teaching process can take place almost anywhere or with the aid of any type of learning medium.

Experiential teaching emphasizes the role of emotional experience in teaching. When students experience more positive emotional experience in learning, it will improve their learning motivation and activate their learning behavior. Therefore, through context setting, experiential teaching can make students intuitively feel the correlation between teaching content, learning necessity and their own relationship, deepen Student's recognition of the value of learning content, activate Student's positive emotions in learning, promote their learning interest, willingness and volitional behavior, and mobilize Student's emotional participation in cognitive processing through multiple teaching means and methods. Strengthen Student's motivation of active exploration and active expansion of cognition. With emotional mobilization as the medium, experiential teaching promotes the adjustment and improvement of

Student's cognition and behavior through diversified means, and finally improves their Learning achievement and Learning attitude.

Experiential teaching Steps :

Step1 : creating clinical situations

Step2 : setting learning objectives

Step3 : guiding problem exploration

Step4 : in-depth case interpretation

Step5 : carrying out cooperative exercises

Step6 : evaluating learning results

1.5.4 Learning achievement:

"Learning achievement" refers to the change in an individual's abilities within a certain range after a certain amount of teaching, training, or effort. Whether it is adults, teenagers, or children, certain changes will occur through learning, covering aspects such as cognition, concepts, attitudes, and behavior. There are also many ways to present learning achievements, including quizzes, presentations, internship assignments, speeches, performance in daily life and work, etc. From this, it can be seen that learning achievement refers to the changes that occur through learning, including cognitive, emotional, and skill levels, which are presented in various forms.

Evaluation tool: The learning achievement mentioned in this paper refers to the questions of Student's knowledge tests after a period of learning.

1.5.5 Learning attitude

Learning attitude: The so-called learning attitude refers to a relatively stable psychological tendency of learners towards various objects involved in school learning activities. It includes cognitive level, emotional experience and behavioral tendency. Learning attitude is the internal preparation of learners for learning activities. It is a key

link to determine a person's success in learning and one of the important factors that affect Student's learning effects.

(1) Cognitive level

The cognitive level of learning attitude refers to the learners' understanding and evaluation of learning activities and learning objects involved in the learning process, mainly the judgment of their value. Cognitive level is the basis of learning attitude, and learning cognition mainly includes cognition evaluation and value judgment on learning purpose, learning significance and learning achievements.

The cognitive level of surgical nursing learning attitude of medical vocational students refers to the value judgment of students on learning activities and various objects involved in the learning process. The cognitive level of Student's learning attitude is affected by their own experience and external environment. Both their own learning experience and the surrounding environment are shaping and influencing Student's learning cognition. For example, learning environments are all passive learning, passive acceptance, and teachers can do whatever they say, so students will rethink and judge the meaning and value of learning under the influence of the surrounding environment. If the surrounding environment or personal experience continuously strengthens the student's positive evaluation of learning value, then the Student's cognitive level will also change.

(2) Emotional experience

The emotional experience of learning attitude refers to the emotional experience and internal feelings of students on learning activities and learning objects involved in the learning process. Emotional experience is an important part of learning attitude, which supports and regulates learning attitude.

The emotional experience of medical vocational Student's learning attitude refers to the emotional experience and internal feelings of students on learning activities and various objects involved in the learning process. Student's emotional experience has a lasting and profound impact on their learning attitude. Good emotional experience can constantly stimulate students to have positive learning behavior and learning cognition;

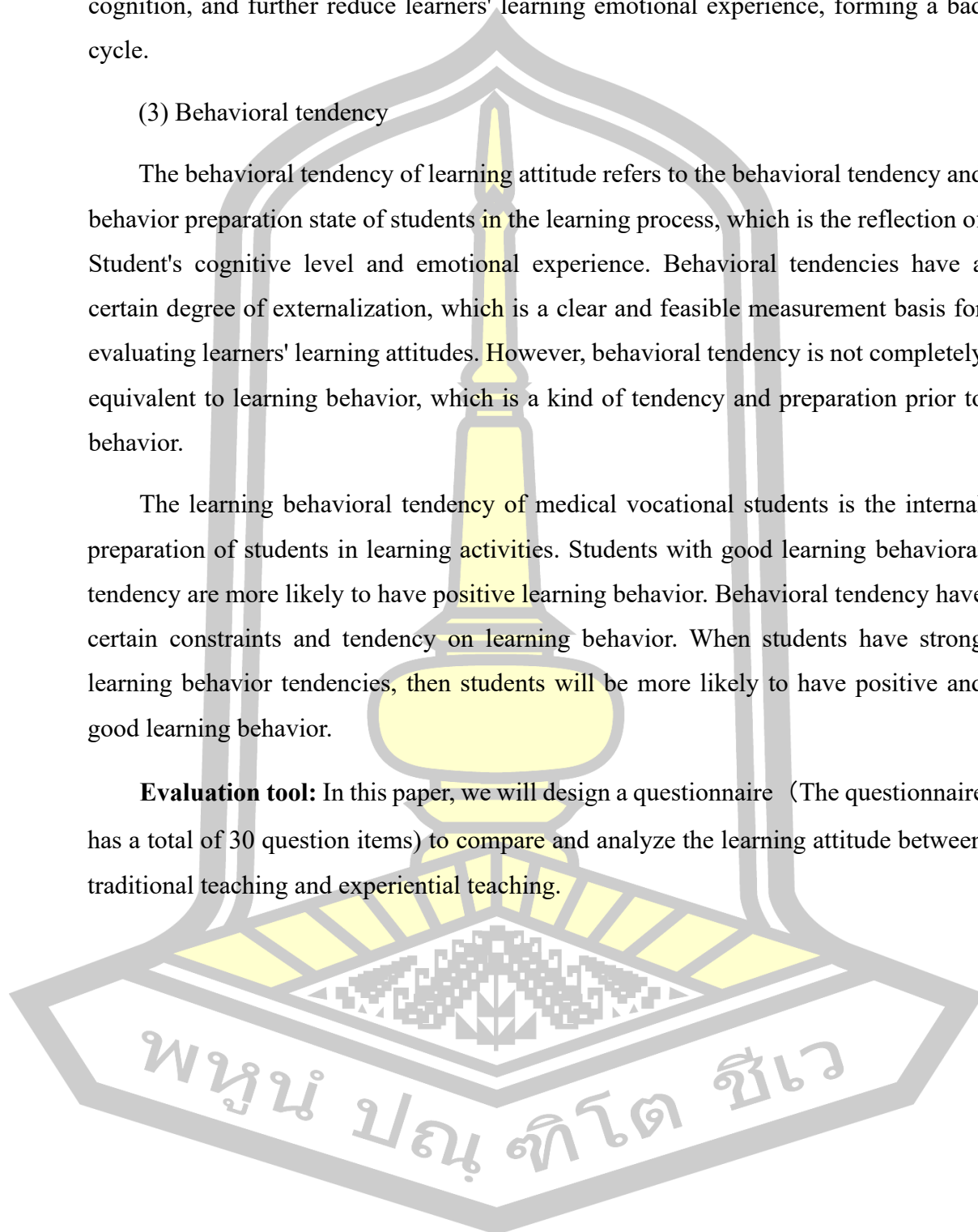
Negative emotional experience will affect learners' learning behavior and learning cognition, and further reduce learners' learning emotional experience, forming a bad cycle.

(3) Behavioral tendency

The behavioral tendency of learning attitude refers to the behavioral tendency and behavior preparation state of students in the learning process, which is the reflection of Student's cognitive level and emotional experience. Behavioral tendencies have a certain degree of externalization, which is a clear and feasible measurement basis for evaluating learners' learning attitudes. However, behavioral tendency is not completely equivalent to learning behavior, which is a kind of tendency and preparation prior to behavior.

The learning behavioral tendency of medical vocational students is the internal preparation of students in learning activities. Students with good learning behavioral tendency are more likely to have positive learning behavior. Behavioral tendency have certain constraints and tendency on learning behavior. When students have strong learning behavior tendencies, then students will be more likely to have positive and good learning behavior.

Evaluation tool: In this paper, we will design a questionnaire (The questionnaire has a total of 30 question items) to compare and analyze the learning attitude between traditional teaching and experiential teaching.



CHAPTER II

LITERATURE REVIEW AND CONCEPTUAL FRAMEWORK

This chapter mainly introduces the experiential teaching method used in the teaching of "surgical nursing" and the relevant theories of learning achievement and learning attitude in the traditional teaching method, as well as the research status at home and abroad.

2.1 Surgical Nursing

2.2 Experiential teaching and methods and Traditional teaching methods

2.2.1 Relevant theories of experiential teaching methods

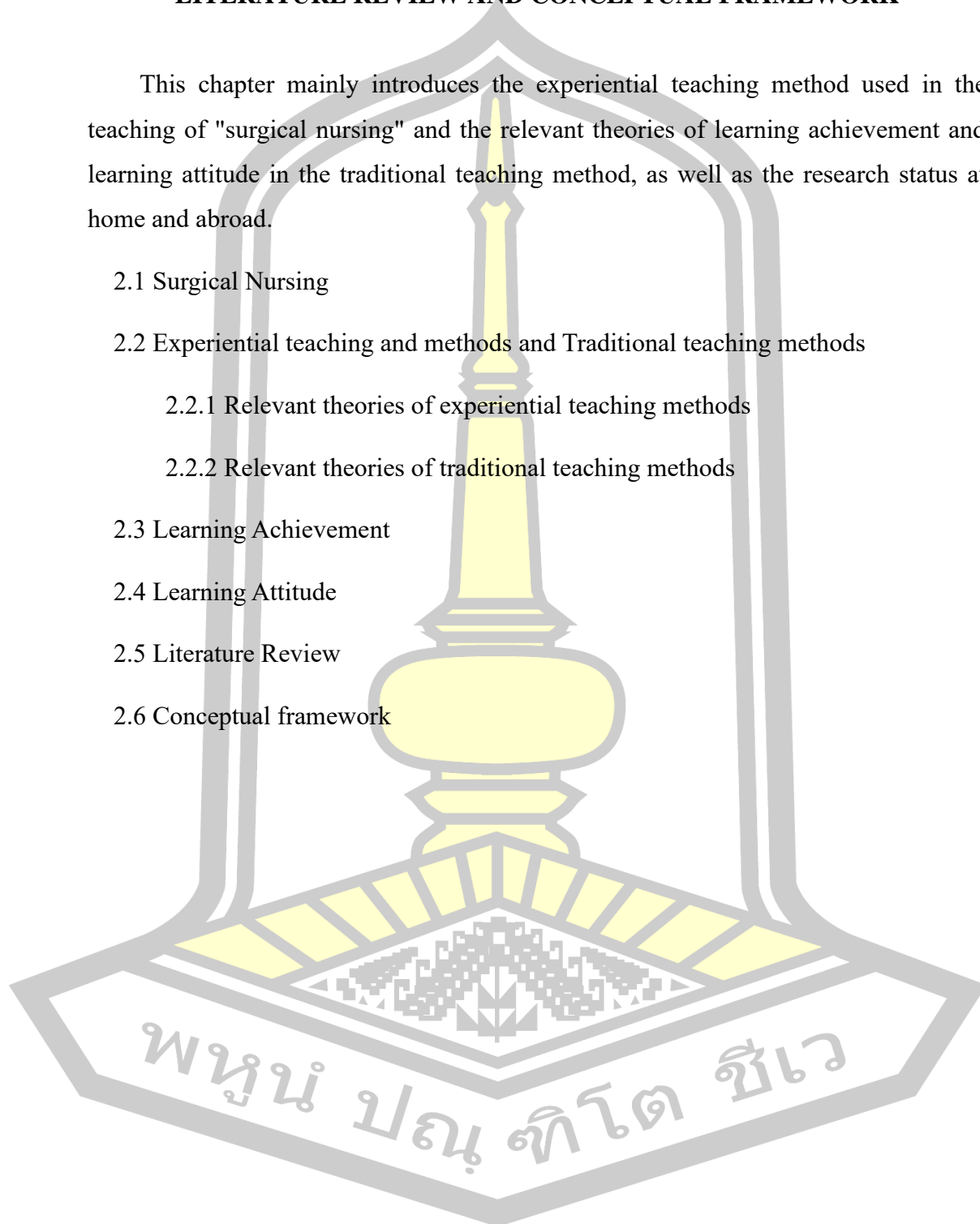
2.2.2 Relevant theories of traditional teaching methods

2.3 Learning Achievement

2.4 Learning Attitude

2.5 Literature Review

2.6 Conceptual framework



2.1 Surgical Nursing

2.1.1 Meaning

Surgical nursing is an important component of nursing. It is a clinical nursing course that elaborates and studies the holistic care of surgical patients. It is a compulsory core course for nursing students, including the professional knowledge and skills required for nursing positions. It is also a key content of the nurse qualification exam. (Lu Guizhi,2018)

The research variables applied to this article are: Experiential teaching. Traditional Teaching. Learning achievement. Learning attitude

2.1.2 Component

Surgical nursing focuses on surgical patients with trauma, infection, tumors, deformities, obstruction, stones, and functional impairments, and its scope is guided by modern medical models and nursing concepts. Through the overall learning of this course, we can collaborate with other medical workers in wards and operating rooms to provide holistic care for various surgical patients based on their physical and mental health needs, social and family cultural needs, and with human health as the center, applying nursing programs to provide patients with holistic care.

2.1.3 Importance

Through the study of this course, students will master the nursing of patients with common surgical diseases and focus on cultivating their thinking and methods of using nursing procedures.

Adhere to the principle of putting people first, utilize the basic professional knowledge and skills of this course, and smoothly carry out overall nursing services for surgical patients in clinical hospitals, community health service institutions, elderly care service institutions, and other institutions at all levels.

2.1.4 Measurement

The course of surgical nursing is taught in two semesters, with theoretical exams organized after each semester.

The purpose of the theoretical exam is to test Student's mastery of the knowledge of surgical related diseases learned this semester, laying a solid foundation for the subsequent nurse qualification exam.

The exam questions include (Total score 50 points): 3 noun explanations, 2 short answer questions, 1 case studies, and 15 multiple-choice questions

2.2 Experiential teaching and methods and Traditional teaching methods

2.2.1 Relevant theories of experiential teaching methods

(1) Meaning

Chapman S defines experiential teaching as a process that enables students to complete emotional learning and describes the experiential process as a series of critical relationships: learners to themselves, learners to teachers, and learners to the learning environment. He believes that experiential teaching is not just about learning by doing, but about integrating life into learning. (Chapman S, 1992)

I tin clearly states that experiential learning is a purposeful process designed to enhance student's ability to understand, utilize, and influence experiences. (I tin, 2001)

Experiential teaching is a teaching method dominated by Student's experiences. Students gain experience through full participation in activities, and then share their experiential ideas under the guidance of teachers, in order to understand the teaching content in practical activities. The focus of experiential teaching is for teachers to create learning contexts, allowing students to experience, touch, and feel firsthand, guiding them into a state of sensation, stimulating their inner emotions, and enabling them to fully develop. (Lu Ye, 2021)

To summarize the previous experts' theories, the experiential teaching method mentioned in this study is based on the definition of (Lu Ye, 2021). Experiential teaching is a teaching method dominated by Student's experiences. Students gain experience through full participation in activities, and then share their experiential ideas under the guidance of teachers, in order to understand the teaching content in practical activities.

(2) Component

The "experiential teaching" involves Constructivism Theory, Experiential Learning Theory, Humanism Theory, and Achievement Goal Orientation Theory.

1) Constructivism Theory

Piaget's basic view on constructivism: children gradually construct knowledge about the external world in the process of interaction with the surrounding environment, so as to develop their own cognitive structure. The interaction between children and environment involves two basic processes: "assimilation" and "adaptation". Assimilation refers to the process in which individuals integrate the information provided by external stimuli into their original cognitive structure; Adaptation refers to the process in which an individual's cognitive structure changes due to the influence of external stimuli. Assimilation is the expansion of the number of cognitive structures, while adaptation is the change of the nature of cognitive structures.

Cognitive individuals achieve balance with their surroundings through assimilation and adaptation: when children can assimilate new information with existing schemas, they are in a balanced cognitive state; When the existing schema cannot assimilate new information, the balance is destroyed, and the process of modifying or creating new schema (adaptation) is the process of finding new balance. Children's cognitive structure is gradually constructed through the process of assimilation and adaptation, and constantly enriched, improved and developed in the cycle of "balance imbalance new balance".

Constructivism advocates learner centered learning under the guidance of teachers, that is to say, it not only emphasizes the cognitive subject role of learners, but also does not ignore the guidance role of teachers. Teachers are helpers and promoters of meaning construction, not knowledge imparters and indoctrinators. Students are the subject of information processing and the active constructors of meaning, rather than the passive recipients and indoctrinated objects of external stimuli. To become an active constructor of meaning, students are required to play a principal role in the learning process from the following aspects:

1) We should use the method of exploration and discovery to construct the meaning of knowledge.

2) In the process of meaning construction, students are required to actively collect and analyze relevant information and materials, and put forward various assumptions about the problems they learn and try to verify them.

3) We should try to connect the things reflected in the current learning content with the things we already know, and seriously think about this connection. "Connection" and "thinking" are the key to meaning construction. If the process of connection and thinking can be combined with the process of negotiation (i.e., the process of communication and discussion) in collaborative learning, students will have higher efficiency and better quality in meaning construction. There are two kinds of negotiation: "self-negotiation" and "mutual negotiation" (also called "internal negotiation" and "social negotiation"). Self-negotiation refers to arguing with oneself about what is right; Mutual consultation refers to the discussion and debate within the learning group.

In this paper, based on this theory, the following two points are integrated in experiential teaching:

(1) by creating conform to the requirements of the teaching content of the situation and prompt clues of communication between old and new knowledge, help students construct the knowledge meaning; Arouse Student's interest in learning and help them form learning motivation;

(2) in order to make the construction more efficient, I might in organization under the condition of collaborative learning, discussion and communication), and to guide the collaborative learning process make it toward the direction of development in the meaning construction. The methods of guidance include asking appropriate questions to arouse Student's thinking and discussion; Try to lead the problem step by step in the discussion to deepen the Student's understanding of what they have learned; To inspire revulsive students themselves to find the law, to correct and complement or one-sided understanding.

2) Experiential Learning Theory

The root of the theory of experiential learning (ELT) lies in the theoretical study of experience by Dewey, Lewin and Piaget. The experiential learning theory is different from the behavioral learning theory which tends to emphasize cognition. The behavioral learning theory does not allow consciousness and subjective experience to play any role in the learning process, while the experiential learning theory affirms the core position of experience in the learning process.

David A. Kolb's experiential learning cycle is the clearest expression of experiential learning. Experiential learning mode is a cyclical process of learning experience. In order to learn effectively, learners must go through the whole cycle. Cooper described it as "four stage cycle involving four adaptive learning modes". The four stage learning model describes two dimensions of acquiring experience - specific experience and abstract concepts, and two dimensions of transforming experience - reflective observation and active experience (David . Kolb, 2008) .

Experiential learning involves the creative tension between the four learning abilities. In the four stage learning cycle described in Figure 1-1, specific experience is the basis for observation and reflection. After receiving the experience, learners refine the specific experience into abstract concepts through reflection, from which new meanings of experience can be derived and used as an action guide to create new experience (Yuliati L,2020)

Different people have different learning habits. For example, when mastering experience, some people will experience the concrete objects of the world to perceive new information and immerse themselves in the concrete reality relying on their senses, while some people tend to perceive new information through symbols or abstract concepts. When converting and dealing with experiences, some people choose to observe others' actions and reflect on them, while others will choose to actively participate in actions and experiments. Therefore, the learning method is flexible and has a unique processing structure of choice (David . Kolb, 2008) .

According to this theory, combined with the characteristics of students, in view of the use of experiential teaching methods, the teaching steps are integrated and revised:

Table 1 Six steps of experiential teaching implementation

Teaching Steps	Specific implementation content
Step1: creating clinical situations	According to the diseases taught, use videos, cases, PPT, pictures and other clinical scenarios in class.
Step2: setting learning objectives	Students set learning goals based on the set clinical scenarios combined with group discussions on the problems to be solved
Step3: guiding problem exploration	Organize and guide students to explore problems
Step4:in-depth case interpretation	The teacher plays the role of "problem coordinator", guiding the students to express different views on the same issue by guiding the problem exploration, then organizing research and discussion, and finally summarizing and displaying the research results, sorting out the logic, and helping the students to establish a systematic knowledge system
Step5: Carrying out cooperative exercises	Organize students to carry out cooperative exercises, so that students can "learn by doing and doing in learning"
Step6: evaluating learning achievements	Use self-evaluation, others evaluation, teacher evaluation

3) Humanism Theory

The core of Rogers' Humanism Theory thought is to take students as the main body, emphasizing that students should be the center in the teaching process, paying attention to Student's experience, mobilizing Student's initiative and exploration, teachers must pay attention to Student's ideological and emotional needs, and free learning atmosphere plays a great role in Student's growth. Only when students think that the learning content is related to their life needs can they devote themselves to the learning process and exert great creativity. Rogers believes that the main task of teachers is to provide learners with means of learning, experience and perception, rather than teaching students knowledge and how to learn. Students should decide what way to learn.

According to this theory, in the experience type teaching, as a student situation or experience learning carrier, give students enough space to play creation, let the student positive thinking, free to express their ideas. Experiential teaching fully embodies the educational thought of humanism Theory.

4) Achievement Goal Orientation Theory

Achievement goal orientation theory is a learning motivation theory developed on the basis of achievement motivation theory of J.W. Atkinson (Ji Y L, Lim K Y, 2020). The goal is the result of a specific task that a person strives to achieve and serves as the purpose of their behavior (Li Mei Qian, 2020). This is consistent with the requirements of experiential teaching, which allows students to actively participate in exploring issues that they think are meaningful. Therefore, the theory of achievement goal orientation supports experiential teaching. When students work hard towards the set goals, such a learning process is meaningful.

The goal orientation theory divides achievement goals into mastery goals and performance goals (Ji Y L, Lim K Y, 2020). Among them, mastery goals guide learners to focus on improving their ability through learning, while performance goals guide learners to focus more on obtaining positive judgments of their ability. Learners with mastery goals will attach great importance to the intrinsic value of learning. They prefer challenges, participate in learning more, and standardize their learning strategies. Therefore, mastering target orientation is considered as an adaptive attribute.

Goal setting is a key process of self-regulation. Self-regulation is a process of achieving goals. It will produce a series of behaviors such as "intentionally using specific processes, strategies or responses". The motivation behind the goal is inseparable from the regulatory process of achieving the goal. First, mastery-oriented learners set their own learning goals and participate in self-monitoring more frequently. Because their goal is to improve their understanding ability, these learners are more likely to use various learning strategies and deeper cognitive processing strategies. In other words, mastery goals are more positively related to self-regulation. Performance methods and avoidance goals have different relationships with self-regulation.

Performance goal-oriented learners invest less time and energy in learning, and they participate less in deep activities and more in surface activities.

According to this theory, in the actual teaching situation, I pay more attention to the cultivation of Student's learning mastery goal orientation, emphasize the task goal of new class learning and classroom practice, and actively seek task feedback, so as to stimulate students to use deep processing strategies, promote students to establish adaptive goal orientation mode, and improve Student's self-efficacy.

(3) Improvement

Experiential teaching can fully mobilize Student's learning enthusiasm, and truly feel, operate and discover in the learning process. Under the attraction and promotion of the scene, Student's learning is naturally integrated, and various senses will automatically participate in it. Experiential teaching directly combines the learning and application process, which is more conducive to Student's understanding of the significance of the knowledge, skills and methods learned, and internalizing emotions, attitudes and values through learning.

In experiential teaching, teachers design to make the content they want to learn concrete and visual, so that students can directly participate in the scene, and almost mobilize all the Student's senses. The knowledge that students experience has a greater impact on their thinking than the language description, which leaves a deeper impression on students.

Experiential teaching means that students are required to participate and experience in person through their own experience, whether it is visit, scene simulation, role play or other specific experiential learning activities. During the activity, all the sense organs of students are mobilized to learn emotions in various ways.

(4) Measurement

After implementing experiential teaching in surgical nursing, theoretical test questions and learning attitude questionnaires were used to assess learning outcomes.

Learning Achievement : Theoretical test paper:

Learning Attitude : Learning Attitude Questionnaire:

The questionnaire on traditional teaching and learning attitudes of vocational college students and the questionnaire on experiential teaching and learning attitudes used in This research are both based on the "Self Report Scale on Learning Attitudes of Primary and Secondary School Students" written by Tao De qing

The questionnaire was scored using a five scale method, and each question was divided into five levels: Totally disagree, Basically disagree, Somewhat Agree, Basically agree, Totally agree, corresponding to a score of 1, 2, 3, 4, and 5 points. From this, a score of 3 can be used as the cutoff to adjudicate the conclusion of each question, with a score greater than 3 indicating positivity, a score equal to 3 indicating neutrality, and a score less than 3 indicating negativity. In the same way, the questions from this part of the questionnaire, averaged by the actual score, can also be divided into a boundary of 3 points, with 1-2 points indicating negative attitudes, 3 points indicating general attitudes, and 4-5 points indicating positive attitudes.

(5) Experiential teaching Teaching Steps :

Step1 : reating clinical situations

Creating a clinical situation linking surgical nursing knowledge to a learning authentic clinical case is intended to enhance Student's interest in the course, stimulate Student's motivation to learn, and improve Student's problem-solving ability. Context based learning has a positive impact on the learning process, and if students can relate a concept and its practice to clinical practice, effective learning occurs and students will more readily recognize and understand the clinical use of surgical nursing. Teachers should choose suitable teaching tools and multimedia according to the teaching content, and create a situation that is close to the clinic for students.

Step2 : setting learning objectives

In the experiential teaching of surgical nursing, the learning objectives are not put forward unilaterally by the teacher, but by the Student's heartfelt determination to solve the problem according to the clinical situation created by the teacher, which gives full play to the autonomy of the students as their own teachers. Teachers, when designing

instruction, need to provide opportunities for students to explain their experiences and help students find meaning in learning.

Step3 : guiding problem exploration

Teachers should create an atmosphere of trust so that students have the space to express their views and understandings, and the discord generated in such a process gives learners the opportunity to bring theory into the clinic and gain valuable insights about self and interaction with the world at large. In the process of constantly asking questions and exploring the answers to questions, students can speak freely. In the end, students have a thorough understanding of the course content, and at the same time, the interactive experience between teachers and students and the communication experience between students and students are also enhanced.

Step4 : in-depth case interpretation

The guided Problem Inquiry session and the deep case interpretation session are presented in a circular fashion throughout the pedagogical flow, and if guided problem inquiry is a process in which experience and experience collide, then deep case interpretation can be understood as a process in which experience and. The introduction and in-depth interpretation of the case, rather than giving the student a standard template of answers, provides an idea and approach in which the instructor provides the student with the opportunity to see and feel their relationship to the wider world and develop the student's appreciation, understanding, and participation in their thoughts, in relation to others, and the environment.

There are differences in the perspective of different Student's understanding of the case, at which point the teacher takes on the role of the "problem coordinator," leading the students through guided problem inquiry to articulate different views of the same problem, then organizing research and discussion, and finally summarizing and presenting the research findings, teasing out the logic in it and helping the students establish a systematic body of knowledge. The main task of the " deep principle interpretation " link teacher is to systematize piecemeal pieces of knowledge.

Step5 : carrying out cooperative exercises

Based on Student's deep knowledge and understanding of surgical nursing diseases, teachers organized cooperation exercises. At this point, the design significance of "carrying out cooperative practice" is to exercise Student's ability of knowledge transfer, which also corresponds to the "action application" in the experiential learning circle. Cooperative practice here does not only refer to the completion of practice problems, but also can include role play, live demonstration, experimental operation, game experience, and so on.

Step6 : evaluating learning results

In the experiential teaching of surgical nursing, it is not the ultimate goal to check whether students master the knowledge taught in class, but the main body of classroom evaluation is students and teachers. Evaluation can be either result or process, it can be the evaluation of the results of case analysis, it can also be the evaluation of the results of practice questions, it can also be the evaluation of role playing and so on. It can occur in specific practical training operations, in the analysis and discussion of problems, and can be an evaluation of Student's performance in innovation consciousness, cooperation and communication, information processing and self-expression.

2.2 Experiential teaching and methods and Traditional teaching methods

2.2.2 Relevant theories of traditional teaching methods

(1) Meaning

The traditional teaching method refers to the classroom teaching system in which a teacher teaches a whole class of students at the same time when faced with a class of several people, the same teaching progress and similar levels of knowledge (Li Ming, 2018).

Traditional Teaching Method regards teaching as a funnel, inculcating all the learning content into Student's minds. In order to make students remember these contents, repeated learning and repeated practice is the best and most common practice (M H, 2010).

According to the above literature, it can be concluded : In the course of "Surgical Nursing", Traditional Teaching Method refers to the teaching method in which teachers systematically and carefully explain design norms and cases, and require students to observe and imitate, so that students can master basic knowledge .

(2) Component

Teachings: In traditional teaching, teachings are a common method of delivering information to students. A teacher or professor stands in front of the class and presents information verbally.

Textbooks: Traditional teaching often relies on textbooks as primary learning resources. Students read assigned chapters and complete exercises or assignments based on the content.

Teacher-Centered: Traditional teaching tends to be teacher-centered, where the teacher is the primary source of knowledge and authority in the classroom.

Classroom-Based: Traditional teaching typically occurs in a physical classroom with students and teachers present in the same location.

Structured Curriculum: There is often a structured curriculum that outlines what topics are to be covered and when they should be covered.

Standardized Testing: Assessment in traditional teaching often involves standardized tests and exams to measure student learning.

Homework and Assignments: Students are typically assigned homework and assignments to reinforce what they've learned in class

(3) Improvement

Building Fundamental Knowledge: Traditional teaching methods, which often include teacher-led instruction and the use of textbooks, are effective for helping students establish a solid foundation of knowledge. This approach is especially useful for imparting basic concepts and principles, particularly in subjects like science, mathematics, nursing and engineering.

Structured Approach: Traditional teaching typically comes with a clear structure and plan, allowing teachers to gradually convey knowledge according to a curriculum outline. This helps students better understand the organization and progression of the subject matter.

Wide Applicability: Traditional teaching methods are applicable to students of various age groups and educational backgrounds. They can be employed in elementary, secondary, higher education, and adult education settings.

Ease of Assessment: Traditional teaching often involves assessment methods such as exams, quizzes, and assignments. These methods are relatively straightforward to administer and manage, and they can provide standardized assessments.

Teacher-Student Interaction: Traditional teaching methods foster direct interaction between teachers and students. Students can ask questions, engage in discussions, and receive feedback, which aids in clarifying doubts and grasping concepts.

(4) Measurement

After the completion of surgical nursing teaching, theoretical tests are usually used to test Student's learning situation. Theoretical tests include: noun explanation, single choice, short answer questions, and case analysis.

(5) Traditional Teaching Steps :

Step1 : Determine teaching objectives

First, teachers specify the course content to be taught according to the syllabus and industry standards. This includes determining the teaching materials, course outline and teaching plan, and then analyzing the background, level and needs of students to determine the teaching objectives of this class.

Step2 : Teachers impart knowledge

Teachers use traditional PPT, multimedia, textbooks and other materials to

teach knowledge. The teaching is completed through oral expression, demonstration, explanation and explanation. In the process, the teacher will set questions and discuss them in time according to the preparation before class.

Step3 : Student participation in classroom activities

According to the questions and discussions raised by the teacher, the students first think or discuss, and then actively answer, share their opinions and understanding, and ask the teacher if they do not understand.

Step4 : Summary and induction

Before the end of the class, the teacher will use PPT, pictures and animations to summarize and summarize the key points and difficulties of the class, and then lead the students to review the achievement of the teaching goals and help them master the knowledge.

Step5 : Assigning homework after class

At the end of the class, teachers will assign homework according to the completion of the course tasks and the degree of Student's knowledge mastery. Through reasonable homework arrangement, teachers can promote Student's learning growth and improve their independent learning ability.

2.3 Learning achievement

The definition of "learning achievement" in the Education Dictionary is as follows: "After a certain amount of teaching and training. The change in an individual's ability within a certain range after effort. (Education Dictionary Compilation Committee, 1991). Taiwanese scholar Yang Guode believes that both adults, teenagers, and children undergo certain changes through learning. These changes cover aspects such as cognition, beliefs, attitudes, and behavior. These changes can be summarized as cognitive, emotional, and skill levels, as well as learning process archives and multiple learning achievement profiles. There are also many ways to present learning achievements, including quizzes, presentations, internship assignments, speeches, performance in daily life and work, etc. (Yang Guode, 2000). From this, it can be seen

that learning achievement refers to the changes generated through learning, which include multiple levels of cognition, emotions, and skills, and their presentation forms are also diverse.

The learning achievement : mentioned in this paper specifically refers to the scores of Student's knowledge exams after a period of learning. Examples of Test questions are as follows:(See Appendix A)

2.4 Learning Attitude

Professor Tao Deqing believes that learning attitude consists of three parts: cognitive level, emotional experience, and behavioral tendency. Inspired by the A-B-C three-dimensional structure theory, the learning attitude structure was divided into 10 items and a learning state measurement scale was designed. These 10 projects are: understanding the purpose and significance of learning; Understanding of academic performance; Emotional experience in learning; Expression of thirst for knowledge; Proactive learning performance; Planned learning performance; Review behavior during exams; Eliminating difficulties in learning; The behavior of resisting interference in learning; Mastery of learning methods. And measure and study the learning attitude of vocational college students through these 10 projects.(Tao Deqing,1998)In summary, the academic community generally agrees that learning attitude is composed of three dimensions: cognitive level, emotional experience, and behavioral tendency, but different scholars hold different perspectives and insights on the specific components of these three dimensions. Professor Tao Deqing from South China Normal University has a relatively complete theory of learning attitudes, which has been widely applied in the study of learning attitudes.

This article will be based on Tao Deqing's theory of learning attitude and study the learning attitude of vocational school students from projects.

2.5 Literature review

2.5.1 Domestic research status:

Searching for "experiential teaching" on the "China National Knowledge Network" found about 14,999 related articles, 14,236 related journals, and 763 related master and doctoral theses; Searching for experiential teaching in higher vocational schools found about 649 articles and 18 articles in related journals, among which only 9 articles were related to experiential teaching in Surgical Nursing. Although there have been a lot of researches on experiential teaching in China, the researches related to experiential teaching in Surgical Nursing in higher vocational nursing still need to be in-depth..

Research on the value of experiential teaching:

Shang Zhihui (2014) mentioned in her master's thesis, *The Application of experiential teaching in High School ideological and Political Courses -- Taking the box of "Taste Culture" as an Example*, that the application of experiential teaching helps to build a harmonious relationship between teachers and students, realize the three-dimensional curriculum goals of ideological and political courses, help to improve the effectiveness of education and moral education, and also help to improve Student's learning achievement.

Chen Hao (2018) mentioned in a *Brief analysis of the clinical effect of experiential teaching in the training of intensive care unit nurses* that experiential teaching allows students to personally experience the practical process, which can continuously improve their comprehensive theoretical knowledge learning achievement. and practical operation ability.

Zhou Hui-ling (2019) mentioned in the *Application effect of experiential teaching in nursing teaching* that students combine the acquired theoretical knowledge with clinical practice, enhance the ability of students to find and solve problems through simulation exercises, so that students can more skillfully and deeply grasp the content of the course and improve the learning achievement.

Chen Wei (2020) pointed out in *Making Experiential Learning Happen -- Taking Reverence for Life as an Example* that experiential teaching can improve Student's

learning attitude. First, it can make students bid farewell to dependence on learning and actively participate in learning. Second, it emphasizes the cultivation of Student's emotions and believes that experiential teaching can pay attention to Student's emotions.

Research on the application status of experiential teaching :

Wang Na (2011), in her master's thesis "Research on the Causes and Countermeasures of the lack of experiential teaching", believes that in the current classroom teaching, experiential teaching is faced with knowledge-based teaching goals, knowledge structure is fragmented and connected without a system, teaching methods are repetitive and mechanical, and the relationship between teachers and students is dominated by "teacher-receive". These reasons lead to the lack of experiential teaching. This paper also shows how teachers should carry out experiential teaching but does not mention the improvement of Student's learning achievement and learning attitude.

Ying Y qun et al. (2016) mentioned in the Exploration of the Student-Centered Experiential Teaching Model that the existing teaching reform still cannot get away from the teacher-centered teaching model. Compared with traditional teaching, experiential teaching is obviously more respected by students, and it has a great improvement in learning achievement and learning attitude. Experiential teaching makes students more active in learning, provides students with a broader space for autonomy, creates an environment and atmosphere that can delight Student's mood, make students more open and relaxed, and promote the unity of knowledge, emotion and ability in the learning process, so as to better realize the purpose of Student's comprehensive development.

Yu Long sheng (2019) mentioned in the Basic Framework and Misunderstandings of Experiential Teaching of Morality and Rule of Law in Junior High School that the problems faced by experiential teaching at present include: abuse of experiential methods and one-sided understanding of the spirit of the new curriculum; Too much reliance on modern teaching technology and neglect of teaching objectives; The student's subjectivity is overemphasized and the teacher's dominance is downplayed. In

particular, it is mentioned that the use of experiential teaching has greatly improved the learning attitude of students such as enthusiasm and the participation of students.

Based on the domestic research status, the literature collected from the value and application status of experiential teaching was sorted out, and the research status of domestic scholars on experiential teaching was analyzed. In the research level of experiential teaching value, scholars have different views. Most of the students believed that experiential teaching played a positive role in promoting Student's learning achievement, intellectual education, moral education, Student's learning initiative, enthusiasm and learning attitude, which was worthy of promotion in the Surgical nursing classroom.

2.5.2 Foreign research status:

Regarding the concept research of experiential teaching, foreign scholars generally believe that the key words involved in the concept of experiential teaching are experience, interaction, emotion and environment. (Bill Proudman 1992) defined experiential teaching as the process of enabling students to complete emotional learning and described the process of experience as a series of critical relationships: Learners to themselves, learners to teachers and learners to learning environment believe that experiential teaching is not only learning by doing, but also integrating life into learning. Compared with traditional teaching, experiential teaching can improve knowledge mastery.

(I tin 2001) clearly pointed out that experiential teaching is a purposeful process, aiming to improve Student's ability to understand, use and influence the experience . The connotation of experiential teaching is constantly changing in the course of development. The three main variants are interactive experience, embodied experience and practical experience

(Janet Rosentreter, 2003) mentioned in A-Didactic-and- experiential-approach -to-Nursing-Education that Experiential teaching can improve nurses' self-study of anesthetics, and their self-learning attitude is improved.

(Katie Anne Adamson, 2012), In *Piloting a Method for Comparing Two Experiential Teaching Strategies*, it is mentioned that there are obvious improvements in cognition and emotion of learning attitude between the two groups.

(Robert Elliott, 2013) and others introduced experiential training courses into the residency training. Research results showed that experiential training courses made newly recruited doctors acquire better skills than senior doctors after five years, and had better teaching performance than traditional teaching methods.

(Suchy, 2017) introduced experiential teaching into the study of foreign language teaching and carried out educational practice in Masaryk University Brno, and the research results showed that learning achievement of experiential teaching methods were more effective than traditional teaching methods

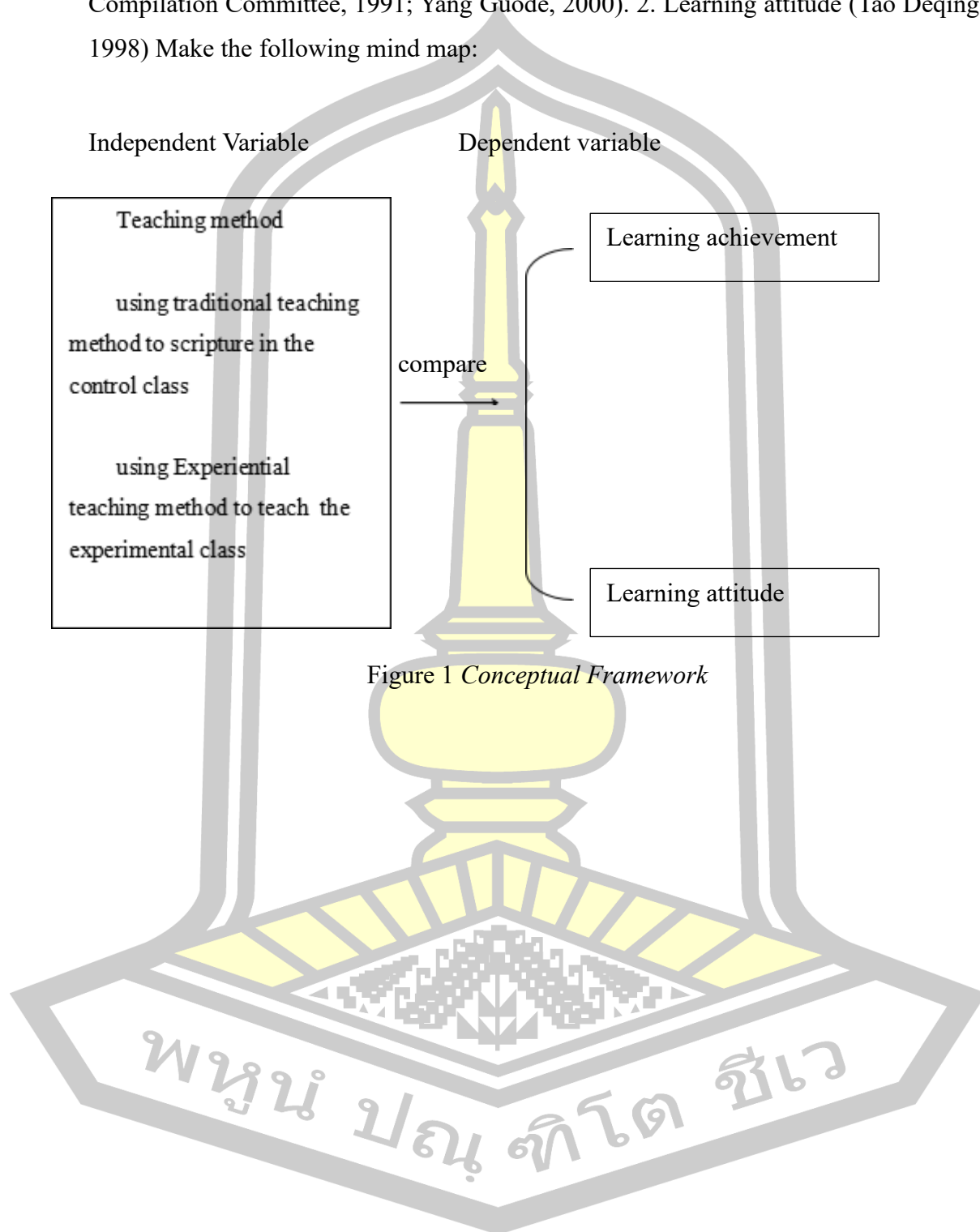
(Robert Voukelatou 2019) implemented experiential teaching in the dance class of a secondary school in Athens, and the research results showed that experiential learning had a positive impact on Student's knowledge acquisition, social skills development and learning attitude

When combining the current situation of foreign research, it is understood that experiential teaching has gone through a long research process abroad. In foreign studies on experiential teaching in foreign language teaching, vocational training, medical education and other aspects, most scholars prefer to study experiential teaching on the theoretical level, and there is relatively little research on the practical level of experiential teaching. Through combining the research status and literature at home and abroad, it is found that scholars at home and abroad have different degrees of research on the theory of experiential teaching, but there is relatively little practical research on how to implement experiential teaching in Surgical nursing course for higher vocational nursing students. Based on this, this paper under the support of experiential teaching theory, in-depth practice, investigation and analysis of the implementation of experiential teaching on learning achievement and learning attitudes

2.6 Conceptual framework

According to the literature review, the independent variables are determined as follows: 1. Experiential teaching (Lu Ye, 2021) 2. Traditional Teaching (Li Ming, 2018;

MH, 2010). Dependent variables: 1. Learning achievement ((Education Dictionary Compilation Committee, 1991; Yang Guode, 2000). 2. Learning attitude (Tao Deqing, 1998) Make the following mind map:



CHAPTER III

RESEARCH METHODS

In the implementation process of this research, the researcher applied a traditional and experiential methods approach to this problem, namely "control group" using an traditional teaching method and "experimental group" using an experiential teaching method approach to compare surgical nursing learning achievement and learning attitudes (cognitive level, emotional experience and behavioral tendency) in 19 higher vocational nursing for vocational college of health and rehabilitation in Si Chuan province ,China

The study was conducted as follows:

- 3.1 Population and Sampling
- 3.2 Research Designs
- 3.3 Research and Constructive Instruments
- 3.4 Data Collection
- 3.5 Data Analysis

3.1 Population and Sampling

3.1.1 Population: The population choose is from SiChuan health and rehabilitation vocational college in Si Chuan province, China. total students number 184 ,the 19 higher vocational nursing 4 classes (Sophomore year of college)

3.1.2 Sampling :

46 students from classes 5 and 46 students from classes 6 of 19 higher vocational nursing for vocational college of health and rehabilitation in Si Chuan province, China.

Control Group : 46 students from classes 5 of 19 higher vocational nursing

Experimental Group : 46 students from classes 6 of 19 higher vocational nursing

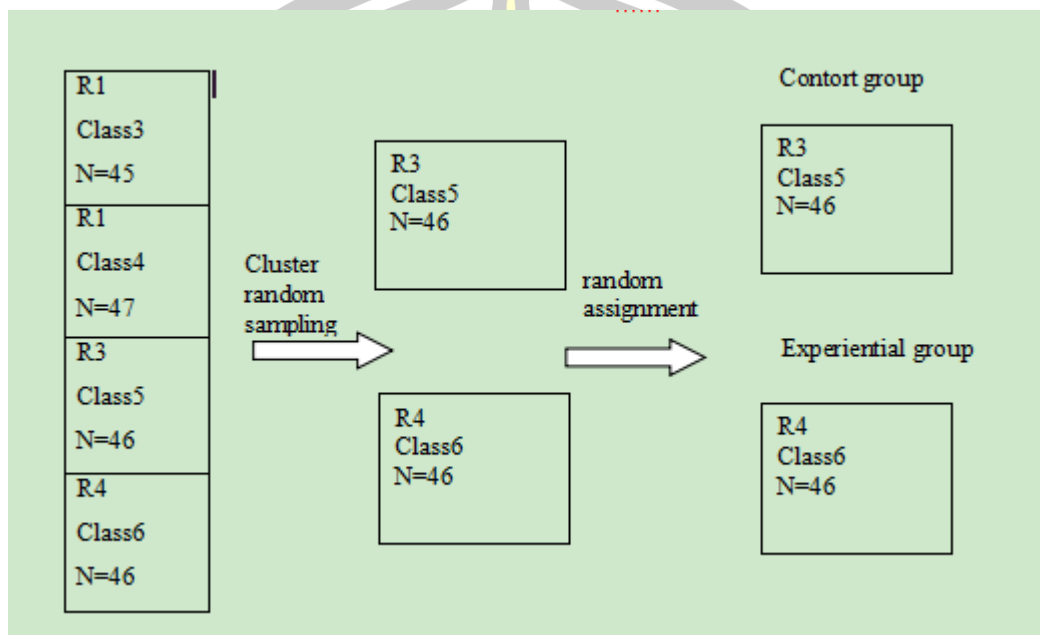


Figure 2 Sample sampling flow chart

3.2 Research Designs:

3.2.1 Experimental purpose

Comparing the influence of traditional teaching method and experiential teaching method on student's learning achievement and learning attitude in the 19 higher vocational nursing for vocational college of health and rehabilitation in Si Chuan province, China

3.2.2 Time and Place of Experiment

Experimental period: May 24 to July 23, 2024, 2 class hours per week, 8 weeks of courses, a total of 16 class hours

Place: Classroom of students in class 5 and 6 of 19 higher vocational nursing for vocational college of health and rehabilitation in Si Chuan province, China

3.2.3 Experimental procedure

(1) Traditional Teaching Method

1): Before the implementation of traditional teaching methods, the teaching plan used by the control class was designed according to the teaching plan and teaching content. In order to ensure the reliability of the study, the control class and the experimental class chose the same teacher, the same time, and the same content for each class. In the teaching process, the teacher explains the textbook contents to the students in the control class according to the teaching progress. In addition, the teacher also gives key guidance according to the general situation of the students. The students can master the surgical nursing knowledge taught by the textbook and the teacher by listening attentively in class, practicing and reviewing the topics after class.

Before the experiment : Students are assessed through a learning achievement test and pre-test data are collected. The learning achievement test covered various aspects of surgical nursing, lasted 60 minutes, and had a total score of 50 points.

2): After 8 weeks of traditional teaching method, students are assessed by learning achievement test and learning attitude questionnaire, and post-test data are collected. The knowledge test covers all aspects of surgical care and lasts 60 minutes with a total score of 50. Vocational college Student's learning attitude questionnaire is an evaluation scale of this course's learning attitude. The questionnaire will be distributed and collected on site at the end of the course to ensure the scientific and accurate data of the questionnaire.

3): Conduct data analysis according to the post-test data. This paper analyzes the student's learning achievement after learning through traditional teaching methods, and the student's learning attitude level after learning through traditional teaching methods. Comparing whether the knowledge and attitude of the students in the control group and the experimental group are different because of the different teaching methods.

Table 2 General design sheet using traditional teaching method

Name of course	Surgical nursing	Teaching dates	
Professional class		Place of delivery	
Teacher of instruction	Mr.Pengfei Liu	Director of the teaching and Research section	Ms.Yan Pan
Teaching hours	2 class hours	Class type	Theory and practice integrated
Teaching Topics	Item 16 Nursing care of patients with acute purulent peritonitis and abdominal injury		
Teaching and learning Object of interest	<ol style="list-style-type: none"> 1. Understand the physical and mental conditions, main nursing diagnosis and nursing measures of patients with acute suppurative peritonitis. 2. Be familiar with the health history, auxiliary examination, and treatment principles of patients with acute purulent peritonitis. 3. Understand the etiology and pathophysiology of patients with acute purulent peritonitis. 4. Be able to correctly assess the condition of patients with acute suppurative peritonitis and provide overall care to the patient. 		
Learning situation Segregation and analysis	<p>This class is a second-year nursing college student. They have learned knowledge about the anatomy and physiology of the peritoneum and peritoneal cavity, as well as basic nursing, introduction to nursing, health assessment and other related courses. They have also had on-the-job experience and clinical internship experience, and have basic skills. Basic professional knowledge and skills. Most students study seriously and have good understanding and logical thinking skills, but their clinical thinking in abdominal surgery specialist nursing needs further guidance. A small number of students lack initiative and enthusiasm in learning, are not good at expressing themselves, and lack self-confidence.</p>		
Point of emphasis	The physical and mental status of patients with acute purulent peritonitis, main nursing diagnosis and nursing measures		
The hard part	Pathophysiology and nursing assessment of patients with acute purulent peritonitis		

Reference test Materials and materials	1. Edited by Chen Xiaoping, Wang Jianping, and Zhao Jizong. Surgery. 9th Edition. People's Medical Publishing House. 2018 2. Li Lezhi, editor-in-chief Lu Qian. Surgical Nursing (Undergraduate). 6th Edition. People's Medical Publishing House. 2017 3. 2021 Nurse Practitioner Qualification Examination Guidance. People's Medical Publishing House. 2020	
Teaching and learning Method of method	Teaching method, discussion method, reading guidance method, question method, etc	
Process of teaching And time points with	Step 1 : Determine teaching objectives	8 min
	Step 2 : Teachers impart knowledge	56 min
	Step 3 : Student participation in classroom activities	10 min
	Step 4 : Summary and induction	4 min
	Step 5 : Assigning homework after class	2 min

(2) Experiential teaching method

1): Before the implementation of the experiential teaching method, the teaching plan of the control class was designed according to the teaching plan and teaching content.

Before the experiment : Students are assessed through an learning achievement test and pre-test data are collected. The learning achievement test covered various aspects of surgical nursing , lasted 60 minutes, and a total score 50.

Preview before class:

Before each class teaching, teachers integrate learning resources according to the teaching content and upload the platform, assign preview tasks, so that students can fully preview before class. Teachers and students exchange guidance, collect feedback, adjust teaching strategies

Classroom teaching:

Organize teaching: Teachers adjust the status, check the Student's dress, and clarify the arrangement and related requirements of this course task

Preview test: The teacher will conduct preview test according to the preview before class, collect the difficult points of the students, and then answer questions and solve doubts.

Presentation of teaching objectives: (1) Introduction of teaching objectives, key and difficult points by teachers; (2) introduction of learning arrangements

Introduce new lessons: Use videos/cases to introduce new lessons, inspire thinking and propose classroom learning tasks

Task 1: The teacher introduced the theme of the situational experience in this class, and the teacher mainly guided and worked in series in different links. Each group selected representatives to present on the stage, other groups raised questions and different opinions, and the teacher commented and supplemented the speeches of the group representatives and the doubts and different opinions of other groups. Secondly, the teacher will further state and conclude the theoretical key points and difficulties involved in this scenario and case.

Task 2: Let the students role-play according to the nursing plan, experience the real clinical nursing scene, let the students personally experience, touch and feel, guide the students to feel, stimulate the internal emotions of the students, so that the students can fully develop the process. In the group review and inter-group review, finally the teacher summed up.

Summary : Summarize the key content of this class, so that students can deepen their impression and inspire thinking, so that students can further clarify their thoughts and understand the important and difficult points of this class.

After class extension:

Extracurricular extension, consolidate what students have learned, and timely teaching feedback, so that teachers can adjust their teaching strategies in the future

Each group will formulate a learning plan according to the lesson plan discussion, and experience, touch and feel according to the set situation in class, and think and finish the report in the group discussion. Finally, teachers should organize students to conduct self-evaluation, mutual evaluation and teacher evaluation.

2): After 8 weeks of experiential teaching, students are assessed by learning achievement test and learning attitude questionnaire, and post-test data are collected. The learning achievement test covers all aspects of surgical care and lasts 60 minutes with a total score of 50. Vocational college Student's learning attitude questionnaire is an evaluation scale of this course's learning attitude. The questionnaire will be distributed and collected on site at the end of the course to ensure the scientific and accurate data of the questionnaire.

3): Conduct data analysis according to the post-test data. The student's learning achievement after experiential teaching method was analyzed and compared with the control group. After experiential teaching, the student's learning attitude was analyzed and compared with that of the control group. Finally, compare whether the achievement and attitude of the students in the experimental class and the control class are different because of the different teaching methods.

Table 3 Six steps of experiential teaching implementation

Teaching Steps	Specific implementation content
Step1:creating clinical situations	According to the diseases taught, use videos, cases, PPT, pictures and other clinical scenarios in class.
Step2: setting learning objectives	Students set learning goals based on the set clinical scenarios combined with group discussions on the problems to be solved
Step3:guiding problem exploration	Organize and guide students to explore problems
Step4::in-depth case interpretation	The teacher plays the role of "problem coordinator", guiding the students to express different views on the same issue by guiding the problem exploration, then organizing research and discussion, and finally summarizing and displaying the research results, sorting out the logic, and helping the students to establish a systematic knowledge system
Step5:Carrying out cooperative	Organize students to carry out cooperative

exercises	exercises, so that students can "learn by doing and do in learning"
Step6:evaluating learning achievements	Use self-evaluation, others evaluation, teacher evaluation

Table 4General design sheet using experiential teaching method

Name of course	Surgical nursing	Teaching dates	
Professional class		Place of delivery	
Teacher of instruction	Mr.Pengfei Liu	Director of the teaching and Research section	Ms.Yan Pan
Teaching hours	2 class hours	Class type	Theory and practice integrated course
Teaching Topics	Item 16 Nursing care of patients with acute purulent peritonitis and abdominal injury		
Teaching and learning Object of interest	<p>1. Understand the physical and mental conditions, main nursing diagnosis and nursing measures of patients with acute suppurative peritonitis.</p> <p>2. Be familiar with the health history, auxiliary examination, and treatment principles of patients with acute purulent peritonitis.</p> <p>3. Understand the etiology and pathophysiology of patients with acute purulent peritonitis.</p> <p>4. Be able to correctly assess the condition of patients with acute suppurative peritonitis and provide overall care to the patient.</p>		

Learning situation Segregation and analysis	This class is a second-year nursing college student. They have learned knowledge about the anatomy and physiology of the peritoneum and peritoneal cavity, as well as basic nursing, introduction to nursing, health assessment and other related courses. They have also had on-the-job experience and clinical internship experience, and have basic skills. Basic professional knowledge and skills. Most students study seriously and have good understanding and logical thinking skills, but their clinical thinking in abdominal surgery specialist nursing needs further guidance. A small number of students lack initiative and enthusiasm in learning, are not good at expressing themselves, and lack self-confidence.	
Point of emphasis	The physical and mental status of patients with acute purulent peritonitis, main nursing diagnosis and nursing measures	
The hard part	Pathophysiology and nursing assessment of patients with acute purulent peritonitis	
Reference test Materials and materials	1. Edited by Chen Xiaoping, Wang Jianping, and Zhao Jizong. Surgery. 9th Edition. People's Medical Publishing House. 2018 2. Li Lezhi, editor-in-chief Lu Qian. Surgical Nursing(Undergraduate). 6th Edition. People's Medical Publishing House. 2017 3. 2021 Nurse Practitioner Qualification Examination Guidance. People's Medical Publishing House. 2020	
Teaching and learning Method of method	Teaching method, discussion method, reading guidance method, question method, etc	
Process of teaching And time points with	Step 1 : creating clinical situations	6 min
	Step 2 : setting learning objectives	2 min
	Step 3 : guiding problem exploration	10 min
	Step 4 : in-depth case interpretation	15 min
	Step 5 : carrying out cooperative exercises	30 min
	Step 6 : evaluating learning results	17 min

3.2.4 Teaching Cases

In the teaching case display, the control group used the traditional teaching plan to teach; The experimental group was taught according to the lesson plan designed by experiential teaching. (See Appendix A)

(1) Nursing Care of Patients with Acute Suppurative Peritonitis (Traditional Teaching)

(2) Nursing Care of Patients with Acute Suppurative Peritonitis(Experiential Teaching)

3.3 Research and Constructive Instruments

This research adopts two teaching methods through quantitative research. Under the premise of controlling other teaching conditions, the teaching situation of the experimental class and the control class is compared: before the experiment, the learning achievement pre-test survey are carried out. After analyzing the pre-test data to ensure that there is no difference between the experimental group and the control group, the experiment can be carried out.

3.3.1 Traditional teaching method:

The control group adopts the traditional teaching method and teaches with the same teacher, at the same time and with the same content. The total teaching time is 8 weeks, with a total of 16 class hours.

3.3.2 Experiential teaching method

The experimental group adopts the experiential teaching method to teach, with the same teacher, the same time, and the same content. The total teaching time is 8 weeks, with a total of 16 class hours.

3.3.3 Research tool

There are three tools for collecting data, evaluated by 5 experts. These 5 experts are as follows:

Professor Zou Jinmei, chief nurse, dean of the School of Nursing, Sichuan Health and Rehabilitation Vocational College.

Professor Pan Yan, chief nurse, director of the surgical nursing teaching and research section of the School of Nursing, Sichuan Health and Rehabilitation Vocational College, and leader of the surgical nursing discipline.

Professor Cai Li, chief nurse, Sichuan Health and Rehabilitation Vocational College, and leader of the surgical nursing discipline.

Professor Liu Jiamei, quality control expert of the School of Nursing, Sichuan Health and Rehabilitation Vocational College,

Professor Xu Ling, head of the medical beauty major of the School of Nursing, Sichuan Health and Rehabilitation Vocational College

(1) Test questions (total score 50) : including the knowledge of the surgical nursing teaching part, question types: noun explanation 3, short answer 2, case analysis 1. single choice 15.

Quality of test questions: The researchers provided the test questions created to measure Student's learning achievements to five professors at Sichuan Nursing College and asked them to evaluate the difficulty and discrimination of the test papers, so that experts could consider and check the quality of content accuracy. By looking for the consistency index (IOC) between the questions and the objectives, it was found that the average values of all the alternative questions were above 0.5. According to the experts' suggestions, some test questions that were not well expressed were improved, and finally all 21 questions could be used in the exam Learning Achievement Test(see Appendix A)

The 5-level (rating scale) of the Likert method (Bunchom Srisa-at. 2008:11) was adopted.

Table 5 Pre-test examination paper screening

Question Type	Examination content	Quantity of examination	Expert review opinions (Select appropriate topics based on the total number)					Identify questions of appropriate quality and consistent with the objectives (Statistical multiplicity)
			Expert 1	Expert 2	Expert 3	Expert 4	Expert 5	
Terminology explanation	Explanation of common terms in thoracic surgery	15	3	3	3	4	2	3
Short Answer Questions	Briefly describe the nursing diagnosis measures for thoracic surgery diseases	10	2	3	2	2	2	2
Case analysis	Analyze cases of patients with chest diseases and answer questions	5	1	1	1	1	1	1
Single choice question	Complete the single choice question for chest diseases	80	16	15	15	13	15	15
Total Quantity								21

Table 6 Post-test examination paper screening

Examination paper Type	Examination content	quantity	Expert review opinions (Select appropriate topics based on the total number)					Identify questions of appropriate quality and consistent with the objectives
			Expert1	Expert2	Expert3	Expert4	Expert5	
Terminology explanation	Explanation of common terms in general surgery	13	4	3	3	3	2	3
Short Answer Questions	Briefly describe the nursing diagnosis measures for general surgical diseases	10	2	3	2	2	2	2
Case analysis	Analyze cases of patients with general surgical conditions and answer questions	7	1	1	1	1	1	1
Single choice question	Complete the single choice question for general surgical diseases	80	15	15	16	13	15	15
Total Quantity								21

Table 7 Experts 'evaluation scale for test examination paper of quality

Examination paper Type	Expert Opinion					Total score/5	result
	Expert1	Expert2	Expert3	Expert4	Expert5		
Terminology explanation	5	4	4	4	4	4.2	Very good
Short Answer Questions	4	5	4	5	3	4.2	Very good
Case analysis	4	5	3	4	5	4.2	Very good
Single choice question	4	5	5	3	5	4.4	Very good
mean	4.25	4.75	4	4	4.25	4.25	Very good

4.51-5.00 Mean Excellence

3.51-4.50 Mean Very good

2.51-3.50 Mean Good

1.51-2.50 Mean Fair

1.00-1.50 Mean Poor

(The 5-level (rating scale) of the Likert method (Bunchom Srisa-at. 2008:11) was adopted,)

(2) teaching plan: Experiential teaching design Validity

Quality of teaching plan: The researchers provided the prepared teaching plan to five professors of Sichuan Nursing College and asked them to evaluate the fit between the teaching plan and the teaching objectives so that the experts could consider and check the accuracy and quality of the content. According to the experts' suggestions, the teaching plan was modified, and finally the final teaching plan was determined after the expert review. Teaching Plan(see Appendix A)

Table 8 Experts' evaluation scale for teaching plans

Teaching plan	Expert Opinion					Appropriate	Result
	Expert 1	Expert 2	Expert 3	Expert 4	Expert5		
Item 16 Nursing care of patients with acute suppurative peritonitis and abdominal injury	5	5	4	4	4	4.4	Very good
Task 1 Nursing care of patients with acute suppurative peritonitis							
Task 2 Nursing care of patients with abdominal injury	4	5	4	5	5	4.6	Very good
Item 15 Nursing care of patients with abdominal external hernia	4	5	5	5	5	4.8	Very good
Practice 1: Nursing care of patients with abdominal injury (case discussion)	4	5	4	3	5	4.2	Very good

Item 17 Nursing care of patients with gastroduodenal diseases							
Task 1 : Nursing care of patients with gastroduodenal ulcer	4	4	5	4	5	4.4	Very good
Task 2: Nursing care of patients with gastric cancer							
Item 18 Nursing of patients with intestinal diseases	5	4	4	5	4	4.4	Very good
Task 1 : Nursing care of patients with acute appendicitis							
Task 2 Nursing care of patients with intestinal obstruction	4	4	5	4	5	4.4	Very good
Task 3 Nursing care of patients with colorectal cancer 1							
Task 3 Nursing care of patients with colorectal cancer 2	4	5	4	5	5	4.6	Very good
Item 19 Nursing care of patients with anorectal diseases	5	4	5	4	5	4.6	Very good

4.51-5.00 Mean Excellence

3.51-4.50 Mean Very good

2.51-3.50 Mean Good

1.51-2.50 Mean Fair

1.00-1.50 Mean Poor

(3) Questionnaire composition

The questionnaire designed in This research has 34 questions, which are roughly divided into the following two parts: The first part was the basic information of the survey subjects, with a total of 4 questions, including the Student's names, classes, genders, whether they were a class leader or not.

The second part designs the problem in three parts based on the theoretical basis of the structure of learning attitude in Chapter 2, which is organized into three dimensions: cognitive, emotional, and behavioral intention. The primary school senior Student's e-learning attitude scale and the lower line learning attitude scale adopted in

This research, both draw from Tao De qing's" the learning attitude of elementary and middle school students has been self-reported "(Tao Deqing,1998). The main purpose of comparison of learning attitude of traditional teaching and learning attitude of experiential teaching was to see whether there were differences in student's learning attitude in traditional classroom and learning attitude when experiential is teaching, because some items were not easy to distinguish between traditional teaching learning attitude and learning attitude of experiential teaching, so these items were not suitable for comparison study, so the inappropriate items were removed and modified. The modified scale was then subjected to quality analysis. The scale has a total of 30 question items, which are divided into three parts, and the specific contents are shown in tables 1-4:

Table 9 Classification of questionnaire content

Classification	Title	
Cognitive level	Awareness of the purpose and significance for students	1.11.21
	Awareness of academic performance.	2.12.22
Emotional experience	Emotional experiences in learning.	3.13.23
	Courtship performance	4.14.24
Behavioral tendency	Learning initiative	5.15.25
	Performance	6.16.26
	Behavioral performance on a review examination	7.17.27
	Study programmatic performance	8.18.28
	Behavioral manifestations of exclusion difficulties in learning	9.19.29.30
	Behavioral manifestations of resistance to interference in learning	10.20
	Mastery of study methods	

The questionnaire was scored using a five scale method, and each question was divided into five levels: totally disagree, disagree, uncertain, basically agree, totally agree, corresponding to a score of 1, 2, 3, 4, and 5 points. From this, a score of 3 can be used as the cutoff to adjudicate the conclusion of each question, with a score greater

than 3 indicating positivity, a score equal to 3 indicating neutrality, and a score less than 3 indicating negativity. In the same way, the questions from this part of the questionnaire, averaged by the actual score, can also be divided into a boundary of 3 points, with 1-2 points indicating negative attitudes, 3 points indicating general attitudes, and 4-5 points indicating positive attitudes. Reverse Title Reverse scoring, where 3, 5, 6, 8, 9, 13, 18, 19, 21, 23, 24, 27, 28, and 29 were entitled reverse. Learning Attitude Questionnaire (see Appendix A)

(2) Questionnaire of learning attitude of vocational college students in sichuan vocational college of health and rehabilitation in Si Chuan province, China. (cognitive level. emotional experience .behavioral tendency validity), reliability and validity test, Ensure the quality of the questionnaire.

It was submitted to five experts (The above mentioned experts.P56) in the field to measure and screen the content validity based on the Index of Item-Objective Congruence (IOC) developed by Rovinelli & Hambleton (1976) in order to achieve validity. Content effectiveness of the Scoring Rubric, use the following formula to determine (IOC):

$$IOC = \frac{\sum R}{n}$$

IOC stands for acceptance index,

$\sum R$ stands for expert summation,

n stands for number of experts.

If the resulting average fell within the range of 0.50 to 1.00, it indicated that the test paper was considered valid

Table 10 IOC Result of the learning achievement questionnaire

Question number	Topic	Expert's opinion					ΣR	IOC	Result
		Expert1	Expert2	Expert3	Expert4	Expert5			
1	I think learning under this teaching method is very important for my future.	1	1	1	1	1	5	1	Selected
2	When studying under this teaching method, I want to work hard to obtain excellent academic results.	1	0	1	1	1	4	0.8	Selected
3	I will be happy if I don't have to study under this teaching method for a few days due to illness.	1	1	1	1	1	5	1	Selected
4	If I encounter a problem that I don't understand during class under this teaching method, I will ask the teacher or classmates for help after class.	1	1	0	1	1	4	0.8	Selected
5	During the study period under this teaching method, I must study under the supervision of the teacher.	1	1	1	1	1	5	1	Selected
6	When taking exams or exercises following this teaching method, I peeked at books or looked up answers online.	1	1	1	1	1	5	1	Selected
7	During the learning period of this teaching method, I can concentrate on studying at the scheduled time and stop doing other things.	1	1	1	1	1	5	1	Selected
8	If you encounter problems that are difficult to understand when learning this teaching method, you will not want to continue learning.	1	1	1	1	1	5	1	Selected
9	After learning this teaching method, I played first, and finally had to do my homework, and even forgot to do my homework.	0	1	1	1	1	4	0.8	Selected
10	During my study of this teaching method, I will ask myself questions while reading.	1	1	1	1	1	5	1	Selected
11	I think students should learn each subject well.	1	1	1	1	1	5	1	Selected
12	I think the poor academic performance under this teaching method is the result of not studying hard.	1	0	1	1	1	4	0.8	Selected
13	Because I am worried that I will be criticized by teachers and parents if I don't participate in the teaching method, I have to participate in the study.	1	1	1	1	1	5	1	Selected
14	During the study of this teaching method, if I encounter a problem that I do not understand, I will try my best to understand the problem.	1	1	1	1	1	5	1	Selected
15	When learning this teaching method, I can concentrate on listening.	1	1	1	1	1	5	1	Selected
16	During the study period under this teaching method, after the teacher announces the answers to exercises or exams, I will carefully check the questions I got wrong.	1	1	0	1	1	4	0.8	Selected
17	During the period of learning this teaching method, I have a good study plan.	1	1	1	1	1	5	1	Selected
18	If you feel that you are having difficulty in learning, you no longer want to study with this teaching method.	1	1	1	1	0	4	0.8	Selected
19	Because of playing, playing with mobile phones or TV, I will forget the learning tasks assigned by the teacher during the class of this teaching method that day.	1	1	1	1	1	5	1	Selected
20	When reviewing after class, I will recall again what the teacher taught under this teaching method to strengthen my memory.	1	1	1	0	1	4	0.8	Selected
21	I think it doesn't matter whether a person goes to school or not.	1	1	1	1	1	5	1	Selected
22	For chapters with poor academic	1	1	1	1	1	5	1	Selected

	performance, I will study diligently and improve my performance.								
23	When learning this teaching method, I feel tired and want to sleep as soon as I pick up the book.	1	1	0	1	1	4	0.8	Selected
24	I feel that I am not smart and it is useless no matter how hard I try.	1	1	1	1	1	5	1	Selected
25	I will review the new content I just learned in the class using this teaching method.	1	1	1	1	1	5	1	Selected
26	During the learning period of this teaching method, I was more nervous than usual before the exam and spent more time reviewing my homework.	1	1	1	1	1	5	1	Selected
27	During the study period of this teaching method, I made a study plan, but I often could not complete it as planned.	1	0	1	1	1	4	0.8	Selected
28	During the period of learning this teaching method, when doing homework, I didn't want to do the questions I didn't know how to do.	1	1	1	1	1	5	1	Selected
29	When the teacher releases discussion tasks, I can no longer study, do homework or practice under the teaching method with peace of mind.	1	1	1	1	1	5	1	Selected
30	When studying under this teaching method, if the surrounding environment is very noisy, I can still concentrate on studying.	1	1	1	1	1	5	1	Selected

After ensuring the quality of the above three tools, a class was randomly selected from the 3 and 4 classes that were not selected for pre-experiment, and the experiment period was two weeks. After collecting data, data analysis was carried out to ensure the quality of the teaching plans, test questions and questionnaires formulated, and then the formal experiment was extended to 5 and 6 classes for two months.

3.4 Data Collection

Before starting the data collection, I contacted the school where I taught and submitted the research proposal to the school's teaching Review committee, informing them of the purpose of the research and the data collection procedure to obtain research approval. Before the study began, I arranged for all students to attend a meeting, solicit their consent and sign the informed consent form.

3.4.1 According to the teaching plan and teaching content, the teaching plan using traditional teaching method and the teaching plan using experiential teaching method are designed respectively. The whole experiment lasted for 8 weeks and 16 class hours.

3.4.2 Collection of Student's performance data. Before and after the experiment, the experimental group with experiential teaching method and the control group with

traditional teaching method shall issue the same test paper respectively. Two groups started the exam at the same time, and four invigilators supervised the exam to maintain discipline and ensure the accuracy and validity of the Student's theoretical knowledge test scores.

3.4.3 Collection of questionnaire survey data. After the end of the course, the experimental group with experiential teaching method and the control group with traditional teaching method will issue the same questionnaire through the learning pass respectively. The questionnaire was collected within the specified time and the data was analyzed

3.5 Data Analysis

Quantitative analysis of the collected data.

3.5.1 The results of the experimental group and the control group (pre-test) confirm that there is no difference in the sample groups, and the results of the students are compared (post-test)

3.5.2 Comparative t-test between the experimental group and the control group

(1)learning achievement :

1)Before the experiment started:

Independent sample T-test on the learning achievement (pre-test) of the experimental group and the control group.

2)After the experiment:

Independent sample T-test on the learning achievement (post-test) of the experimental group and the control group;

Control group: Paired samples t test on learning achievement (pretest) and (posttest)

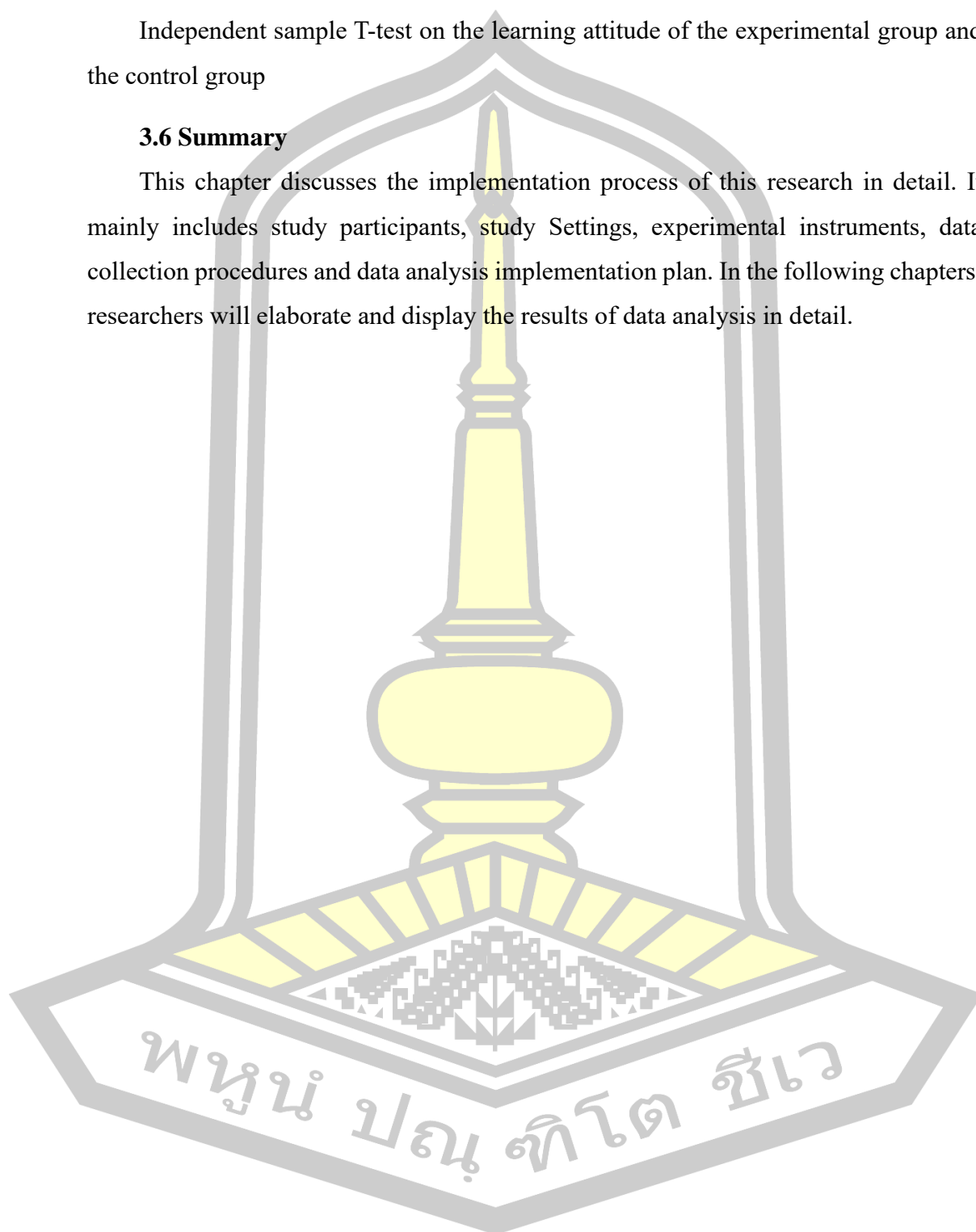
Experimental group: Paired samples t test on learning achievement (pretest) and (posttest)

(2)learning attitude :

Independent sample T-test on the learning attitude of the experimental group and the control group

3.6 Summary

This chapter discusses the implementation process of this research in detail. It mainly includes study participants, study Settings, experimental instruments, data collection procedures and data analysis implementation plan. In the following chapters, researchers will elaborate and display the results of data analysis in detail.



CHAPTER IV

RESULTS

This research, the researcher collected data and used corresponding statistical methods to analyze the results based on the results. To compare learning achievement and attitude toward surgical nursing learning between experiential teaching and traditional teaching for vocational college of health rehabilitation in Sichuan Province, China. Before the experiment, the control group and the experimental group were tested for their learning achievement (pre-test). In the past 8 weeks, the control group used traditional teaching methods and the experimental group used experiential teaching methods. After the experiment, the learning achievement was tested (post-test) and the learning attitude questionnaire was collected. The statistical results were obtained through data analysis.

The steps are as follows:

- 4.1 Symbols used to represent data analysis results
- 4.2 The order of steps for providing data analysis results
- 4.3 Data analysis results

4.1 Symbols used to represent data analysis results

N represent: the number of students in the sample.

df represent: degrees of freedom

Sig represent: significance, which can be expressed as P.

t represents the test statistic used. Compare the critical values in the t distribution to understand its significance.

4.2 The order of steps for providing data analysis result

The first part compared the learning achievement - before the experiment started: the difference between the control group and the experimental group. After the experiment: the difference between the pretest and posttest of the control group; the difference between the pretest and posttest of the experimental group; the difference between the control group and the experimental group.

The second part compares learning attitudes: after the experiment - whether there is any significant difference between the experimental group (experiential teaching method) and the control group (traditional teaching method).

4.3 Data analysis results

4.3.1 The effects of Surgical Nursing learning Achievement

The researchers used SPSS 23.0 to test the normal distribution of Student's knowledge test (pretest, posttest) results. The one-sample Kolmogorov-Smirnov test was used to compare the cumulative frequency distribution of the sample data with the normal distribution. If the difference between the two is small, it indicates that the sample was drawn from a population that follows a normal distribution pattern. In our calculations, we found that in the pre-test: the p-value for traditional teaching was 0.200* and for experiential teaching was 0.200*, both values exceeding 0.05, and in the post-test: the p-value for traditional teaching was 0.168, the p value of experiential teaching is 0.200*, and both values exceed 0.05. It is confirmed that the four sets of data meet the following conditions: Normal distribution (see Table 11)

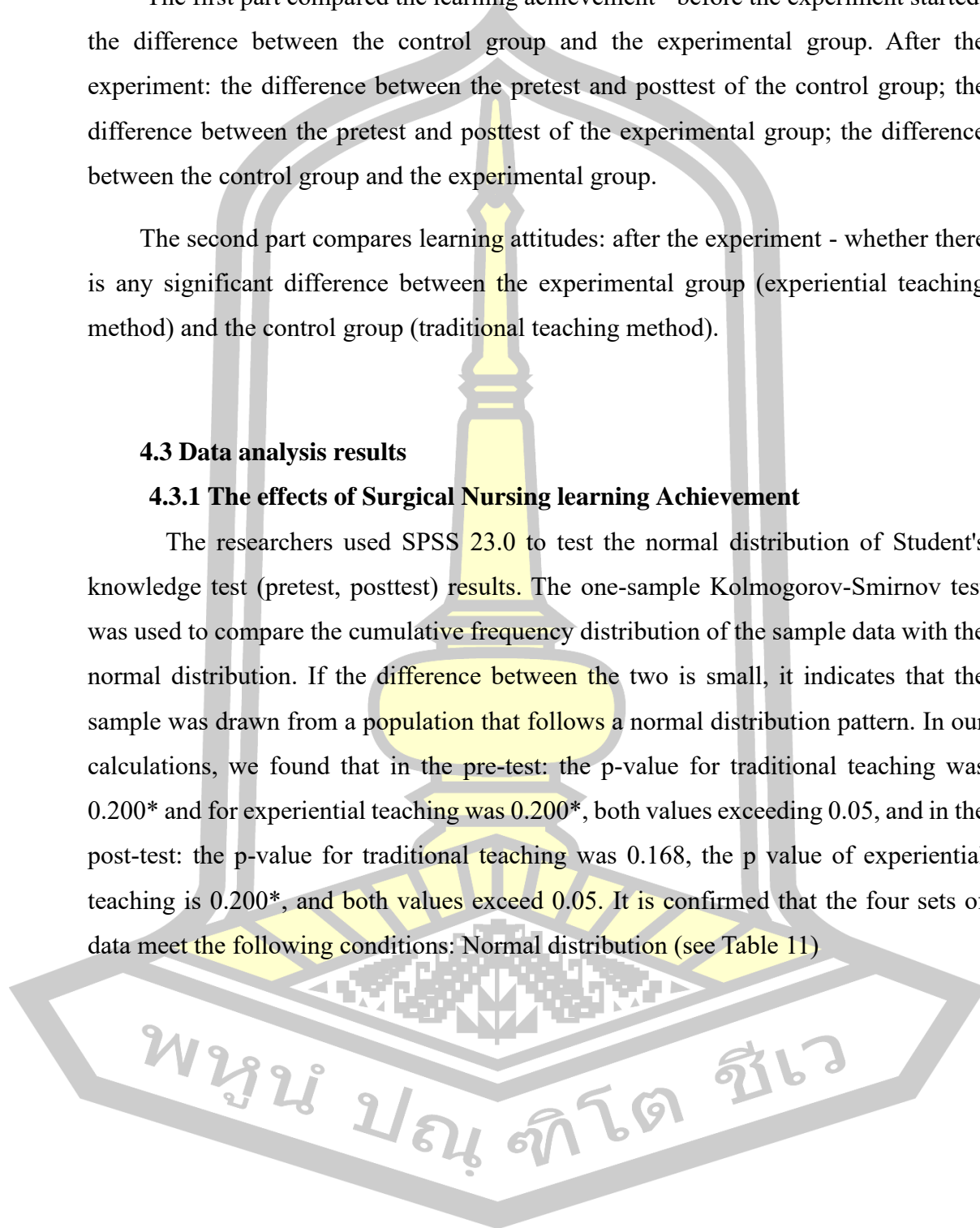


Table 11 Normal distribution test results of knowledge scores for Method 1 (traditional teaching method) and (experiential teaching method)

Tests of Normality		Kolmogorov-Smirnova			Shapiro-Wilk		
	Group	Statistic	df	Sig.	Statistic	df	Sig.
Pre-test	traditional teaching	0.084	46	.200*	0.983	46	0.71
	experiential teaching	0.078	46	.200*	0.982	46	0.701
Post-test	traditional teaching	0.114	46	0.168	0.972	46	0.318
	experiential teaching	0.086	46	.200*	0.985	46	0.829

*. This is a lower bound of true significance.

a. Lilliefors Significance Correction

Note: Because the Kolmogorov-Smirnov Test for normal distributions of knowledge scores indicates that both the significance values (p-values) obtained from Method 1 (traditional teaching) and Method 2 (experiential teaching) are greater than 0.05, we can conclude that the knowledge scores from Method 1 (traditional teaching) and Method 2 (experiential teaching)) follow normal distributions at the 0.05 significance level respectively.

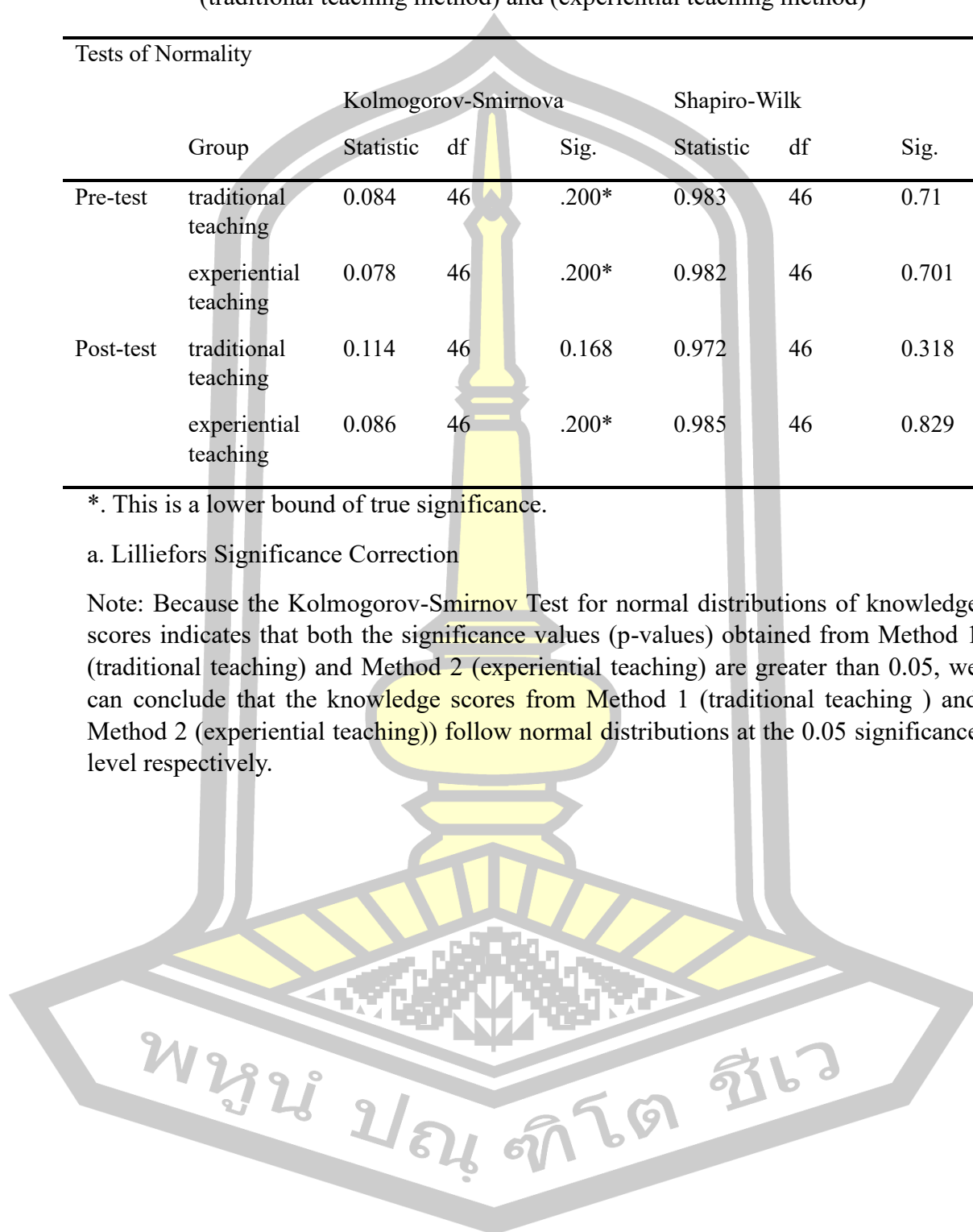


Table 12 Teaching method - (experiential teaching (experimental group)) surgical nursing performance after learning and traditional teaching (control group)) results of comparison using independent sample t-test

		t-test for Equality of Means								
		Levene's Test for Equality of Variances				Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
		F	Sig.	t	df				Lower	Upper
Pre-test	Equal variances assumed	2.365	0.128	0.296	90	0.768	0.21739	0.73348	-1.23980	1.67458
	Equal variances not assumed			0.296	84.906	0.768	0.21739	0.73348	-1.24099	1.67577
Post-test	Equal variances assumed	1.780	0.186	-3.202	90	0.002	-2.90217	0.90622	-4.70254	-1.10181
	Equal variances not assumed			-3.202	84.106	0.002	-2.90217	0.90622	-4.70426	-1.10009

Note:Pre-test results: The results of traditional teaching method and experiential teaching method were subjected to independent sample T test, $P=0.768$, $P \geq 0.05$, indicating that the contrast effect was not significant, and there was no significant difference between the two groups. Post-test results of traditional teaching method and experiential teaching method Carry out independent sample T test, $P=0.002$, $P \leq 0.05$. It indicates that the contrast effect is significant

As shown in Table 12, the independent sample T test on the pre-test scores of traditional teaching method and experiential teaching method, the corresponding significance sig value is 0.768, $P \geq 0.05$, not significant level, indicating that traditional teaching method and experiential teaching method The difference in scores is not significant and can be tested. The independent sample T test on the post-test scores of experiential teaching method and experiential teaching method has a corresponding significance sig value of 0.002, $P \leq 0.05$, reaching a significant level, indicating that experiential teaching and traditional There was a significant difference in the scores on the post-test of teaching methods.

Table 13 Traditional teaching method paired sample statistical table

		Mean	N	Std. Deviation	Std. Error Mean
traditional teaching	Pretest	24.3478	46	3.05663	0.45068
	Post-test	32.0217	46	3.72672	0.54947

Note: Traditional teaching method: The mean score of the post-test data is 32.0217, which is significantly higher than the pre-test data of 24.3478, with a mean difference of 7.67391.

Table 14 Traditional teaching method paired samples t test

		Paired Differences			95% Confidence Interval of the Difference		t	df	Sig. 2-tailed
		Mean	Std. Deviation	Std. Error Mean	Lower	Upper			
Traditional teaching	Pre-test	-7.67391	3.72412	0.54909	-8.77984	-6.56799	-13.976	45	0.000
	Post-test								

Note: Traditional teaching method: The T distribution value of the paired T test of the pre- and post-test scores is -13.976, the corresponding significance value is 0.000, and the P value ≤ 0.05 , reaching the significance level, indicating that the pre-test and post-test of the two groups of traditional teaching are directly There are significant differences in data scores.

As shown in Table 14, the T distribution value of the paired T test on the pretest-post test scores of the traditional teaching method is -13.976, the corresponding significance sig value is 0.000, and the P value ≤ 0.05 , reaching the significance level, indicating that the traditional teaching pretest There is a direct significant difference between the two groups of data scores in the post-test. From the paired sample statistical results shown in Table 13, it can be seen that the mean score of the post-test data is 32.0217, which is significantly higher than the pre-test data of 24.3478, with a mean difference of 7.67391.

Table 15 Experiential teaching method paired sample statistical table

		Mean	N	Std. Deviation	Std. Error Mean
Experiential teaching	Pretest	24.1304	46	3.92490	0.57869
	Post-test	34.9239	46	4.88759	0.72064

Note: Experiential teaching method: The statistical results of paired samples show that the mean score of the post-test data is 34.9239, which is significantly higher than the pre-test data of 24.1304, with a mean difference of 10.79348.

Table 16 Traditional teaching method paired samples t test

		Paired Differences			95% Confidence Interval of the Difference		t	df	Sig. 2-tailed
		Mean	Std. Deviation	Std. Error Mean	Lower	Upper			
Experiential teaching	Pretest-Post-test	-10.79348	6.31979	0.93180	-12.67022	-8.91673	-11.583	45	0.000

Note: Experiential teaching method: The T distribution value of the paired sample T test of the pretest and posttest scores is -11.583, the corresponding significance value is 0.000, and the P value ≤ 0.05 , reaching the significance level, indicating that the pretest and posttest experiential There is a significant difference between the two sets of data scores for teaching.

As shown in Table 16, the T distribution value of the paired T test on the pretest-posttest scores of the experiential teaching method is -11.583, the corresponding significance sig value is 0.000, and the P value ≤ 0.05 , reaching the significance level, indicating that before the experiential teaching There is a significant difference between the data scores of the two groups of test and post-test. From the paired sample statistical results shown in Table 15, it can be seen that the mean score of the post-test data is 34.9239, which is significantly higher than the pre-test data of 24.1304, with a mean difference of 10.79348.

Comprehensive analysis: Table 10 shows that there is a significant difference in the post-test scores between experiential teaching and traditional teaching methods. Adding Table 13, Table 14, Table 15 and Table 16 shows that the mean score of the post-test data for traditional teaching methods is 32.0217, which is significant. It is higher than the pre-test data of 24.3478, and the mean difference is 7.67391. The mean score of the post-test data of the experiential teaching method is 34.9239, which is significantly higher than the pre-test data of 24.1304, with a mean difference of 10.79348, Mean:34.9239>32.0217, Mean difference:10.79348>7.67391, Then experiential teaching methods significantly improve Student's surgical nursing performance.

4.3.2 The effects of Surgical Nursing learning attitude

The results showed that the experiential teaching method of the experimental group and the traditional teaching method of the control group $P=0.013$, $P\leq 0.05$, reaching the significance level, indicating that the experiential teaching method significantly improved Student's learning attitude compared with the traditional teaching method.

After the course, all students in the experimental class and the control class participated in a questionnaire on learning attitudes toward the “Surgical Nursing” course. The survey was conducted on site and included 30 questions. Questionnaires were distributed and collected on site, with a recovery rate of 100%. Through the single-sample Kolmogorov-Smirnov test, we found that $p \geq 0.05$ in some dimensions of the experimental group and the control group, indicating that the two sets of data did not meet the normal distribution conditions (see Table 17).

Table 17 Normal distribution test of each dimension of learning attitude scale

		Kolmogorov-Smirnova			Shapiro-Wilk		
		Statistic	df	Sig.	Statistic	df	Sig.
Cognitive level	Traditional teaching	0.195	46	0	0.937	46	0.015
	Experiential teaching	0.153	46	0.009	0.949	46	0.042
Emotional experience	Traditional teaching	0.128	46	0.058	0.958	46	0.092
	Experiential teaching	0.127	46	0.06	0.963	46	0.147
Behavioral tendency	Traditional teaching	0.153	46	0.009	0.949	46	0.041
	Experiential teaching	0.095	46	.200*	0.972	46	0.318
Total	Traditional teaching	0.131	46	0.046	0.933	46	0.011
	Experiential teaching	0.095	46	.200*	0.952	46	0.055

* This is a lower bound of the true significance.

a Lilliefors Significance Correction

Note: Cognitive level dimension: traditional teaching method and experiential teaching method $p=0.015$, $p=0.042$, emotional experience dimension: traditional teaching method and experiential teaching method $p=0.092$, $p=0.147$, behavioral tendency: traditional teaching method and experiential teaching method Teaching method $p=0.041$, $p=0.318$, overall dimension: traditional teaching method and experiential teaching method $p=0.011$, $p=0.055$. The above table shows that: the two sets of data of the traditional teaching method and the experiential teaching method do not conform to the normal distribution. Two independent samples Mann-Whitney test was used to compare the learning attitudes of the experimental group and the experimental group.

Table 18 Mann-Whitney Test-ranks of various dimensions of learning attitude

	group	N	Mean Rank	Sum of Ranks
Cognitive level	Traditional teaching	46	40.62	1868.5
	Experiential teaching	46	52.38	2409.5
	Total	92		
Emotional experience	Traditional teaching	46	40.77	1875.5
	Experiential teaching	46	52.23	2402.5
	Total	92		
Behavioral tendency	Traditional teaching	46	40.21	1849.5
	Experiential teaching	46	52.79	2428.5
	Total	92		
Total	Traditional teaching	46	39.59	1821
	Experiential teaching	46	53.41	2457
	Total	92		

พหุ ประถมศึกษา

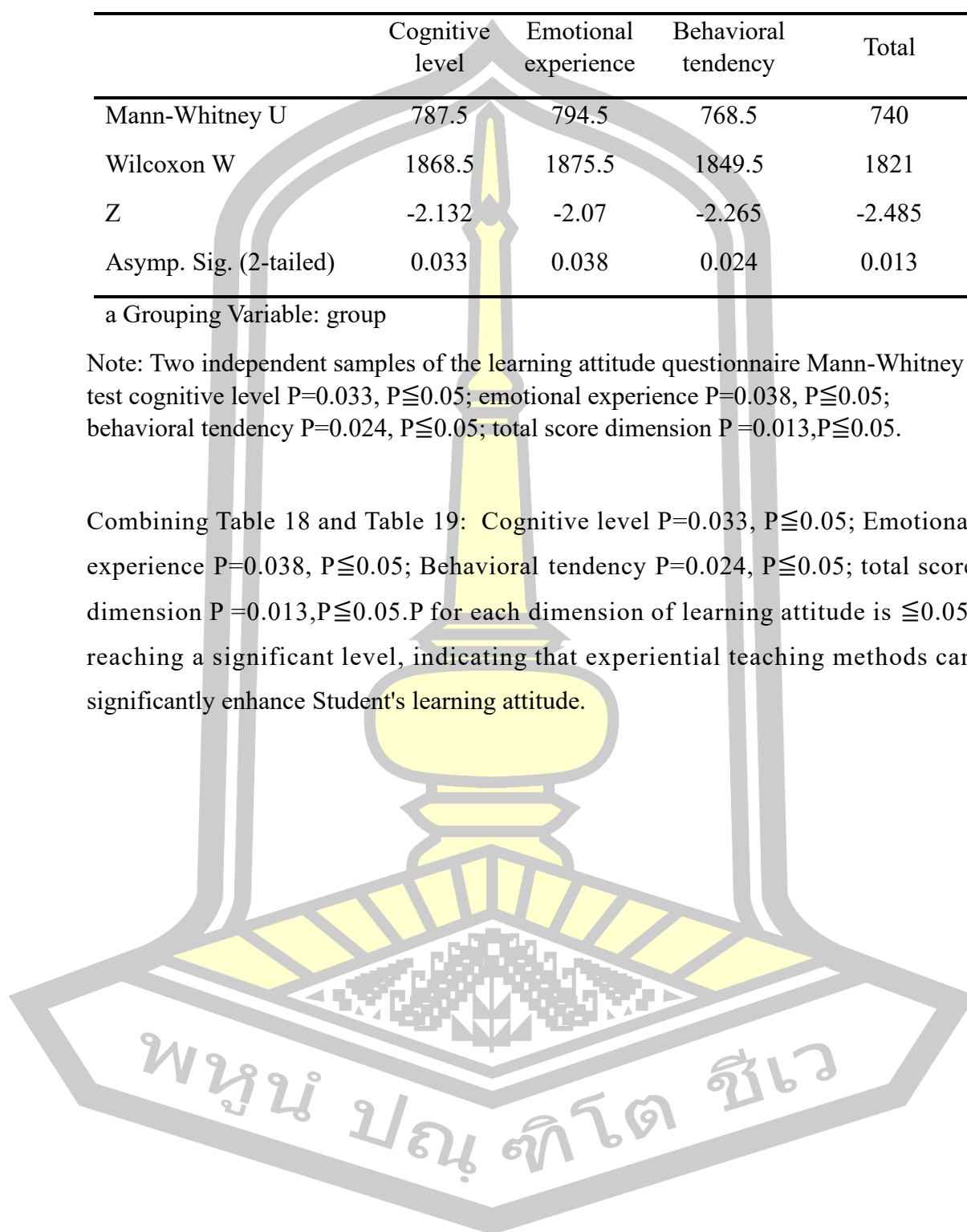
Table 19 Test Statistics of various dimensions of learning attitude

	Cognitive level	Emotional experience	Behavioral tendency	Total
Mann-Whitney U	787.5	794.5	768.5	740
Wilcoxon W	1868.5	1875.5	1849.5	1821
Z	-2.132	-2.07	-2.265	-2.485
Asymp. Sig. (2-tailed)	0.033	0.038	0.024	0.013

a Grouping Variable: group

Note: Two independent samples of the learning attitude questionnaire Mann-Whitney test cognitive level $P=0.033$, $P \leq 0.05$; emotional experience $P=0.038$, $P \leq 0.05$; behavioral tendency $P=0.024$, $P \leq 0.05$; total score dimension $P=0.013$, $P \leq 0.05$.

Combining Table 18 and Table 19: Cognitive level $P=0.033$, $P \leq 0.05$; Emotional experience $P=0.038$, $P \leq 0.05$; Behavioral tendency $P=0.024$, $P \leq 0.05$; total score dimension $P=0.013$, $P \leq 0.05$. P for each dimension of learning attitude is ≤ 0.05 , reaching a significant level, indicating that experiential teaching methods can significantly enhance Student's learning attitude.



CHAPTER V

SUMMARY, DISCUSSION AND RECOMMENDATION

This research to compare Learning Achievement and Attitude toward Surgical Nursing Learning between Experiential Teaching and Traditional Teaching for Vocational College of Health Rehabilitation in Sichuan Province, China. The research steps and research results are as follows

5.1 Summary of result

5.2 Discussion of result

5.3 Suggestion

5.1 Summary of result

5.1.1 Research purpose

To compare the surgical nursing learning achievement of students between using experiential teaching and traditional teaching methods

To compare the surgical nursing learning attitude of students between using experiential teaching and traditional teaching methods

5.1.2 Research hypothesis

Learning achievements: students who used the experiential teaching method has better learning achievements better than those in the control group

Learning attitude: students who used the experiential teaching method have better learning attitude better than those in the control group

5.1.3 Summary of result

This research adopted an experimental design of traditional teaching methods in the control group and experiential teaching in the experimental group to explore the effectiveness of the learning management plan using experiential teaching methods in five-year higher vocational nursing education. The results are summarized below:

The experiential teaching methods of the experimental group compared with the traditional teaching methods of the control group can significantly improve Student's learning achievements.

The experiential teaching method of the experimental group compared with the traditional teaching method of the control group can significantly improve Student's learning attitude.

5.2 Discussion of result

The findings demonstrate the positive impact of experiential teaching as a guiding principle in study programmes. The study found that an experiential teaching approach improved participants' learning achievement in surgical nursing while also leading to significant enhancements in learning attitudes. Based on these findings, the following discussion will delve into the benefits of experiential teaching in five-year high-pillar nursing teaching, the advantages of experiential teaching methods in surgical nursing teaching, and the improvement of Student's learning attitudes.

5.2.1 Combined with the first research purpose:

This experiment: The experiential teaching methods of the experimental group compared with the traditional teaching methods of the control group can significantly improve Student's learning achievements. This result verifies the research done by (Shang Zhihui, 2014; Chen Hao, 2018; Zhou Hui-ling, 2019); Wang Na, 2011; Ying Y qun et al., 2016; Suchy, 2017; Robert Voukelatou, 2019). The use of experiential teaching methods can be closer to clinical practice. The teaching method that combines theory with practice allows students to experience the particularity of the nursing profession, encourages students to explore practical problems in clinical practice, connect them with clinical scenarios, and actively construct scenarios to reflect, learn and improve. This student-centered, situational experience-based teaching method allows students to quickly remember theoretical knowledge, and their learning achievements are constantly improving.

5.2.2 Combined with the second research purpose:

This experiment: The experiential teaching method of the experimental group compared with the traditional teaching method of the control group can significantly improve Student's learning attitude. This result is consistent with the research of (Chen

Wei,2020; Ying Y qun et al,2016; Yu Long sheng,2019; Janet Rosentreter, 2003; Katie Anne Adamson, 2012; Suchy, 2017; Robert Voukelatou ,2019).Experiential teaching can promote student collaboration and teamwork, allowing students to work together in groups, share ideas, and learn from each other. This teamwork and support helps create a positive and enjoyable learning environment. In addition, in the experiential teaching method, students actively participate in situational experience, giving students the ability to learn independently. This sense of autonomy and participation in the learning process can enhance Student's cognitive level, emotional experience and behavioral tendency , thereby improving their learning attitude.

The results showed a positive impact on the academic performance of the experimental group and the enhancement of learning attitude. These findings support previous research highlighting the benefits of experiential teaching in nursing education and its effectiveness in nursing teaching.

Experiential teaching fosters active, engaging learning experiences and promotes situational experience, collaborative teamwork and role appreciation. These results are particularly beneficial to nursing students in school, because this teaching method makes learning close to clinical practice, combines theory with practice, and allows them to experience the particularity of the nursing profession. The experiential teaching method provides a meaningful and contextualized learning method that encourages students to explore practical problems in clinical practice, connect them with clinical scenarios, and actively construct scenarios to reflect, learn, and make progress. This student-centered, situational experience-based teaching method is very consistent with the development needs and learning styles of nursing.

Incorporating experiential teaching methods into surgical nursing teaching has shown many advantages. Experiential teaching methods provide students with a platform to connect classroom knowledge to problems and situations in clinical practice. In This research, students work on the care of patients with general surgery-related conditions. By taking on these challenges through active scenarios and role-playing, students develop clinical thinking skills, enhance their professional qualities as nurses, and gain a deeper understanding of knowledge. The contextualized and problem-solving nature of experiential teaching in nursing education helps provide students with a more meaningful and relevant learning experience.

Finally, the higher learning attitude exhibited by five-year vocational nursing students toward the experiential teaching method in This research can be attributed to several factors. First, experiential teaching promotes students to actively participate in situational experiences and empowers students with the ability to learn independently. This sense of autonomy and participation in the learning process can enhance Student's motivation and emotional experience. Additionally, experiential teaching methods promote collaboration and teamwork, allowing students to work together in small groups, share ideas, and learn from each other. This kind of teamwork and support help create a positive and enjoyable learning situation. In addition, applying experiential teaching to real clinical situation problems can enhance their cognitive level, emotional experience, and behavioral tendencies.

This research has important implications for educators and policymakers. The positive results observed in terms of academic performance of the experimental group indicate that the incorporation of experiential teaching methods into nursing teaching courses can enhance Student's professional qualities, clinical thinking, problem-solving skills and participation in the learning process. This research provides valuable insights into the potential of experiential teaching as an effective teaching method in nursing education, particularly in the teaching of surgical nursing.

5.3 Suggestion

This research has some limitations that may hinder its generalizability. These limitations are discussed below, followed by suggestions for future research.

5.3.1 Limited sample group

This research aims to investigate the effects of experiential teaching methods and traditional teaching methods on learning achievement and learning attitude in surgical nursing teaching in the 19 higher five-year vocational nursing class. The researcher is engaged in surgical nursing teaching at Sichuan Health and Rehabilitation Vocational College, so the 19 higher five-year vocational nursing class of this school was selected as the survey object. The sample group of This research is limited to one school, and the experimental classes are also limited to two classes, the control group and the experimental group. The research results are still limited to the current sample and may not be generalized to schools with larger environments or different situations.

Therefore, further research on the same issue should increase the size of the sample group, for example, include more classes in the study.

5.5.2 Limited number of research participants and majors

Since This research is a phased study, this research only investigates the impact of experiential teaching methods and traditional teaching methods on academic performance and learning attitudes from the perspective of students, and does not involve the views and opinions of teachers and teaching managers. In order to ensure that the proposed strategies are actually used by school stakeholders; future research should include the opinions of stakeholders themselves.

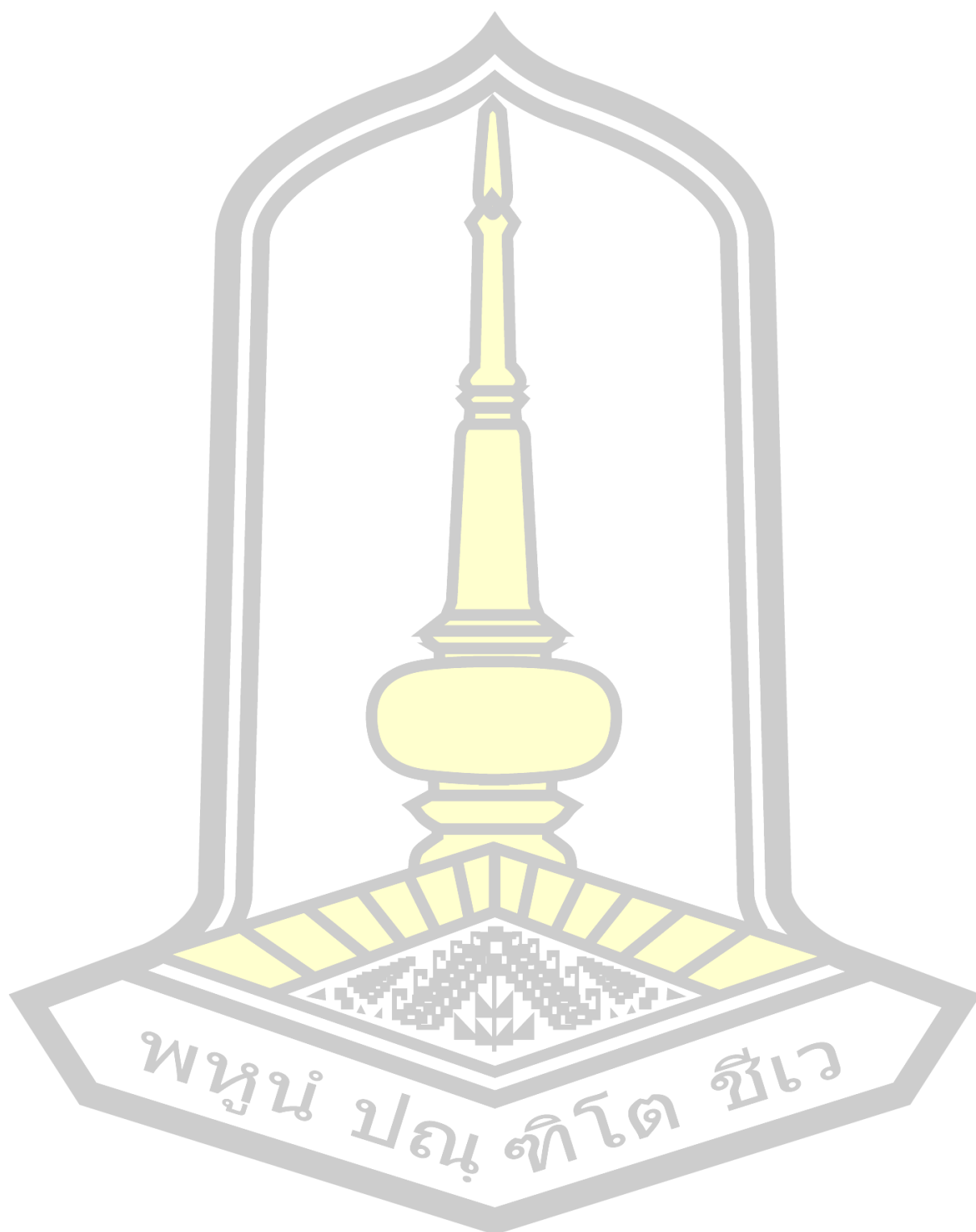
This research is limited to the research of nursing classes in higher vocational colleges of nursing majors, and the design major is limited. Therefore, this research should be extended to medical-related majors in this school or other higher vocational colleges.

For future research, it is recommended that this method be extended to the teaching of other medical-related majors to further study and verify the effectiveness of experiential teaching in teaching different medical majors. Furthermore, exploring the long-term impact and sustainability of the implementation of experiential teaching methods in higher vocational nursing teaching will provide a deeper understanding of its lasting impact on student learning outcomes and skill development. Further research could also focus on optimizing the design and implementation of experiential teaching strategies for different subject areas and grade levels.

For example, the next research topic 1: Exploration of the application path of experiential teaching methods in medical majors;

The next research topic 2: Research on the application of experiential teaching methods from the perspective of curriculum management.

REFERENCES

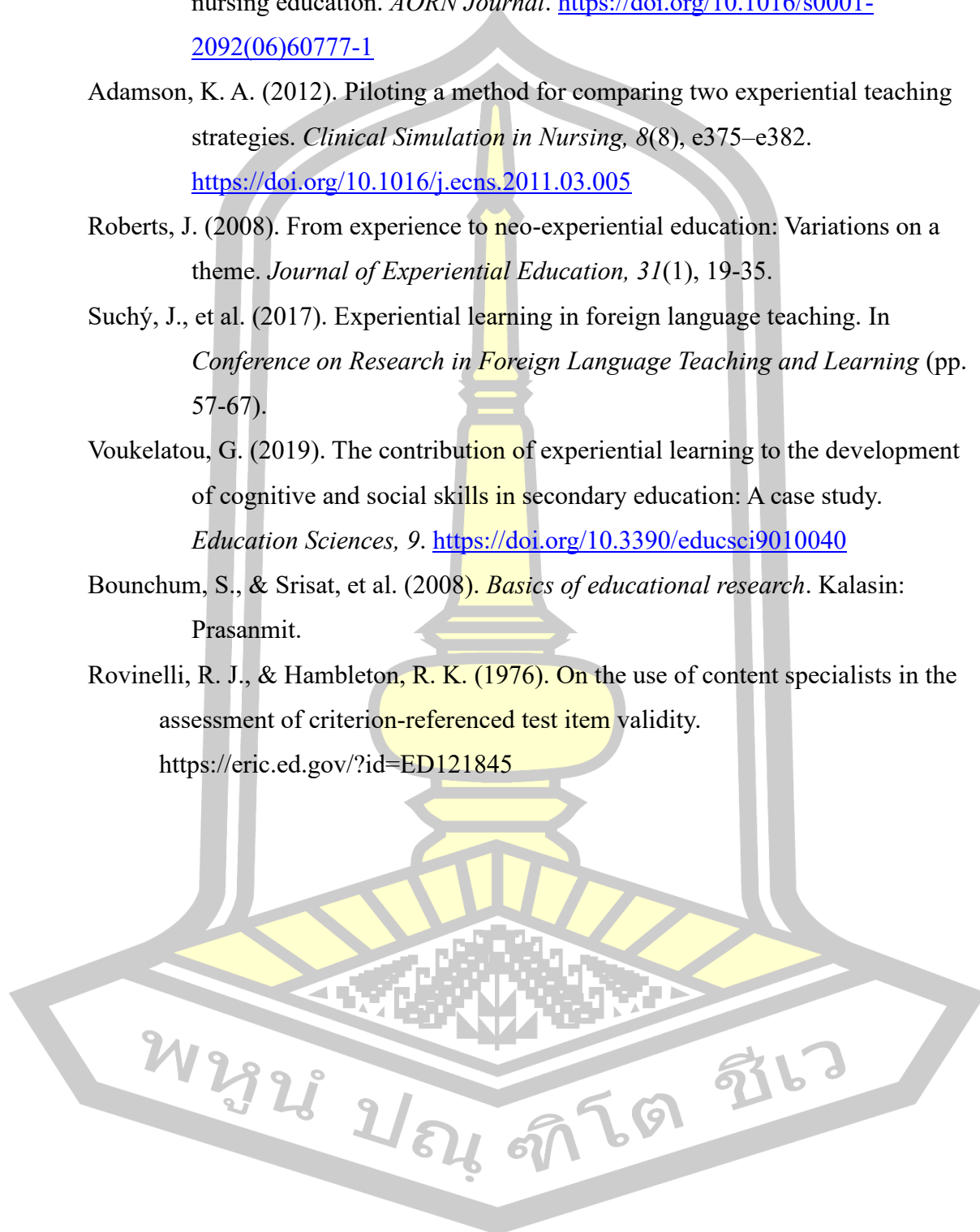


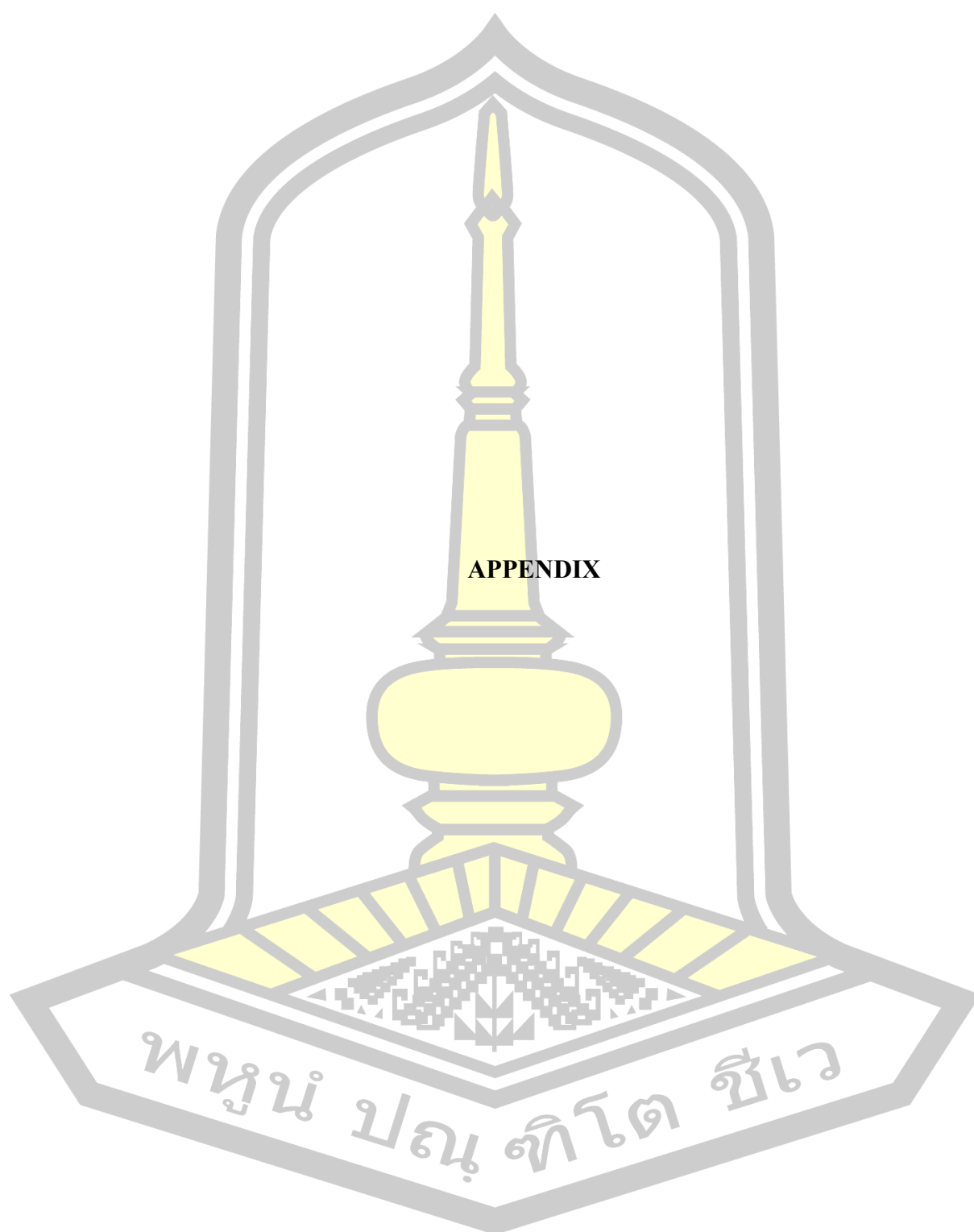
REFERENCES

- Lu, G., Han, B. (Eds.), Cui, L., Zheng, S., & Yu, Y. (Assoc. Eds.). (2018). Surgical Nursing. Beijing: People's Medical Publishing House.
<https://book.oversea.cnki.net/CCGBWEB/book/Detail/OB200409014>
- Liu Xianjun. (2012). On “Student-centered”. Research on Higher Education (08), 1-6.
https://www.cnki.net/KCMS/detail/detail.aspx?dbcode=CJFD&dbname=CJFD2012&filename=HIGH201208000&uniplatform=OVERSEA&v=NnLIdjJ29QCOqFADhErX4047qRgEp1xgx9d7yXfbpWds_Qe_vWOSG_pkHZZAgzN4
- Zhang, L. (2014). Research on the cultivation of self-directed learning ability in students of higher vocational colleges. *China Vocational and Technical Education*, 8, 66-70. <https://doi.org/10.3969/j.issn.1006-9302.2014.08.021>
- Lu, Y. (2021). Exploring the integration of experiential teaching into psychological health education courses in higher vocational maritime colleges. *Journal of Jiamusi Vocational Institute*, 12, 145-147.
<https://doi.org/10.3969/j.issn.1672-3791.2021.12.050>
- Li, H., Zhang, Y., & Li, H. (2021). Research and analysis of situational simulation teaching method in clinical nursing education. **Science and Technology Horizon*, 19*, 136-137. <https://doi.org/10.19694/j.cnki.issn2095-2457.2021.19.61>
- Shang ZhiHui. (2014). *The application of experiential teaching in the high school thought political lesson (a master's degree thesis, shan dong normal university)*.
<https://kns.cnki.net/KCMS/detail/detail.aspx?dbname=CMFD201402&filename=1014192877.nh>
- Chen, H. (2018). Analysis of the clinical effects of experiential teaching in training ICU nursing staff. *Health Road*, 09, 177-178.
<https://doi.org/10.3969/j.issn.1007-5291.2018.09.254>
https://oversea.cnki.net/KCMS/detail/detail.aspx?dbcode=CJFD&dbname=CJFDLASN2018&filename=JKZL201809254&uniplatform=OVERSEA&v=62rtDbua1fK_yQXhSndQMfgFsxAPSq5zG2VKAwHlppsC2RraD4iClgI7v_zs1gDR
- Zhou, H. (2019). Application effects of experiential teaching in nursing education. *China Contemporary Medicine*, 12, 191-193.
<https://doi.org/10.3969/j.issn.1672-5105.2019.12.058>

- Chen, W., & Wang, D. (2020). Let experiential learning really happen: Taking "Reverence for Life" teaching as an example. *Reference for Middle School Political Teaching*, 36, 49-51. <https://doi.org/10.3969/j.issn.1005-0058.2020.36.023>
<https://oversea.cnki.net/KCMS/detail/detail.aspx?dbcode=CJFD&dbname=CJFDLAST2021&filename=ZXZZ202036023&uniplatform=OVERSEA&v=6CZ Z8QhX3f-dm6ynJUMR5Tkd-nLsEkTvtCycqWv1zCLB4fRqiYmqGCS117T55i5>
- Wang, N. (2011). *Study on the causes and countermeasures of the absence of experiential teaching* (Master's thesis, Nanjing Normal University).
<https://kns.cnki.net/KCMS/detail/detail.aspx?dbname=CMFD2012&filename=1011400136.nh>
- Xing, Y., Lu, B., Shi, J., Chen, S., & Qi, Z. (2016). Exploration of a student-centered experiential teaching model: From knowledge to wisdom. *Research in Higher Engineering Education*, 05, 122-128.
<https://doi.org/10.3969/j.issn.1005-0927.2016.05.027>
https://oversea.cnki.net/KCMS/detail/detail.aspx?dbcode=CJFD&dbname=CJFDLAST2016&filename=GDGJ201605027&uniplatform=OVERSEA&v=C6JsLRoUG0EyngL7Qm-GLaREMua6-96UGpSiZ1AFD-bb4pt2o3_bbmEVouvwxrh3
- Yu, L. (2019). Analyzing the basic framework and pitfalls of experiential teaching in junior high school moral and legal education. *Scientific Consulting (Educational Research)*, 12, 24-25. <https://doi.org/10.3969/j.issn.1006-0163.2019.12.014>
https://oversea.cnki.net/KCMS/detail/detail.aspx?dbcode=CJFD&dbname=CJFDLAST2020&filename=KXZK201912014&uniplatform=OVERSEA&v=j_Tb6jA707cE9iBtA0gCaJhtbBiitj5sB9sIUflyK1R_HUYYWw9U7kUBzMYGJw73
- Chapman, S., McPhee, P., & Proudman, B. (1992). What is experiential education? *Journal of Experiential Education*, 15(2), 16-18.
- I tin, I. (2001). Adventure therapy—Critical questions. *Journal of Experiential Education*, 24(2), 80.

- Rosentreter, J., & Talboy, M. L. (2003). A didactic and experiential approach to nursing education. *AORN Journal*. [https://doi.org/10.1016/s0001-2092\(06\)60777-1](https://doi.org/10.1016/s0001-2092(06)60777-1)
- Adamson, K. A. (2012). Piloting a method for comparing two experiential teaching strategies. *Clinical Simulation in Nursing*, 8(8), e375–e382. <https://doi.org/10.1016/j.ecns.2011.03.005>
- Roberts, J. (2008). From experience to neo-experiential education: Variations on a theme. *Journal of Experiential Education*, 31(1), 19-35.
- Suchý, J., et al. (2017). Experiential learning in foreign language teaching. In *Conference on Research in Foreign Language Teaching and Learning* (pp. 57-67).
- Voukelatou, G. (2019). The contribution of experiential learning to the development of cognitive and social skills in secondary education: A case study. *Education Sciences*, 9. <https://doi.org/10.3390/educsci9010040>
- Bounchum, S., & Srisat, et al. (2008). *Basics of educational research*. Kalasin: Prasanmit.
- Rovinelli, R. J., & Hambleton, R. K. (1976). On the use of content specialists in the assessment of criterion-referenced test item validity. <https://eric.ed.gov/?id=ED121845>





Appendix A

Nursing Care of Patients with Acute Suppurative Peritonitis (Traditional Teaching)

Name of course	Surgical nursing	Teaching dates	
Professional class		Place of delivery	
Teacher of instruction	Mr.Pengfei Liu	Director of the teaching and Research section	Ms.Yan Pan
Teaching hours	2 class hours	Class type	Theory and practice
Lecture Topics	Item 16 Nursing care of patients with acute purulent peritonitis and abdominal injury		
Teaching and learning Object of interest	<ol style="list-style-type: none"> 1. Understand the physical and mental conditions, main nursing diagnosis and nursing measures of patients with acute suppurative peritonitis. 2. Be familiar with the health history, auxiliary examination, and treatment principles of patients with acute purulent peritonitis. 3. Understand the etiology and pathophysiology of patients with acute purulent peritonitis. 4. Be able to correctly assess the condition of patients with acute suppurative peritonitis and provide overall care to the patient. 		
Learning situation Segregation and analysis	<p>This class is a second-year nursing college student. They have learned knowledge about the anatomy and physiology of the peritoneum and peritoneal cavity, as well as basic nursing, introduction to nursing, health assessment and other related courses. They have also had on-the-job experience and clinical internship experience, and have basic skills. Basic professional knowledge and skills. Most students study seriously and have good understanding and logical thinking skills, but their clinical thinking in abdominal surgery specialist nursing needs further guidance. A small number of students lack initiative and enthusiasm in learning, are not good at expressing themselves, and lack self-confidence.</p>		
Point of emphasis	The physical and mental status of patients with acute purulent peritonitis, main nursing diagnosis and nursing measures		
The hard part	Pathophysiology and nursing assessment of patients with acute purulent peritonitis		

Reference test Materials and materials	1. Edited by Chen Xiaoping, Wang Jianping, and Zhao Jizong. Surgery. 9th Edition. People's Medical Publishing House. 2018 2. Li Lezhi, editor-in-chief Lu Qian. Surgical Nursing (Undergraduate). 6th Edition. People's Medical Publishing House. 2017 3. 2021 Nurse Practitioner Qualification Examination Guidance. People's Medical Publishing House. 2020	
Teaching and learning Method of method	Teaching method, discussion method, reading guidance method, question method, etc	
Process of teaching And time points with	Step1 : Develop teaching objectives	8min
	Step2 : Teachers impart knowledge	56min
	Step3 : Student participation in classroom activities	10min
	Step4 : Summary and induction	4min
	Step5 : Assigning homework after class	2min

Step1 : Develop teaching objectives

1. Organize teaching (2 minutes): stand up and count the number of people
2. Review old lessons (4 minutes): Question: What are the anatomical and physiological characteristics of the peritoneum and peritoneal cavity?
3. Introduce new lessons (2 minutes): Show cases to students and ask questions to introduce new lessons

Step2 : Teachers impart knowledge

Item 16 Nursing care of patients with acute purulent peritonitis and abdominal injury

Task 1 Nursing care of patients with acute suppurative peritonitis

【Overview】 13 ' Lecture

(1) Concept: Acute purulent peritonitis is an acute purulent inflammation of the peritoneum caused by purulent bacterial infection or stimulation by chemical or physical damage and other factors. Primary cases are rare, and 98% are secondary cases.

(2) Classification:

1. According to the pathogenesis:

Primary: There is no primary lesion in the abdominal cavity, and it is mostly caused by streptococcal infection in the blood, lymphatic tract or genitourinary tract.

Secondary: It occurs on the basis of intra-abdominal injury and disease, such as perforation or rupture of abdominal organs, spread of visceral inflammation, contamination of the abdominal cavity during surgery, etc. E. coli is the most common, and is generally a mixed infection.

2. According to the scope of involvement:

Limitation: no more than 2 quadrants Diffuse: more than 2 quadrants

(3) Pathological changes: inspiring explanations

Stimulation by bacteria, gastrointestinal contents, etc. --- congestion, edema, inflammatory exudation (first serous, then pus) → massive absorption of toxins causing systemic reactions, such as sepsis; water, electrolyte, and acid-base disorders; infectious Shock etc.

【Nursing Assessment】 24'

(1) Health history: explain with examples

1. Secondary: Understand whether there is acute perforation of gastroduodenal ulcer, acute perforation of appendicitis, abdominal trauma, strangulating intestinal obstruction, etc.

2. Primary: Find out whether the child has a history of upper respiratory tract infection; whether there is a history of urinary tract, reproductive tract infection and low body resistance.

(2) Physical condition: inspiring explanation

1. Abdominal pain: persistent severe pain; aggravated by changes in body position; this is the main symptom.
2. Nausea and vomiting: stomach contents or fecal-like intestinal contents.
3. Symptoms of infection and poisoning: fever, rapid pulse, shortness of breath, profuse sweating or septic shock.
4. Signs: Abdominal distension, abdominal breathing↓; peritoneal irritation signs (abdominal tenderness, rebound tenderness, muscle tension, the range reflects the severity) - the most important signs; percussion drum sound, liver dullness shrinks or disappears; abdomen Shifting dullness; bowel sounds diminish or disappear on auscultation.

(3) Psychological condition: Anxiety, irritability (you can ask questions)

(4) Auxiliary inspection:

1. Blood routine (increased white blood cells and neutrophils); serum electrolyte test
2. Imaging examination: abdominal x-ray examination: perforation: free air under the diaphragm; intestinal obstruction: multiple fluid-gas levels; B-ultrasound, CT Or MRI, etc.
3. Diagnostic abdominal puncture: high positive rate

Yellow turbidity, no odor, with food residue: gastric and duodenal ulcer perforation

Thin pus with a slight odor: acute appendicitis

Bloody pus with fishy odor: strangulated intestinal obstruction

Bloody, high amylase: necrotizing pancreatitis

Blood (non-coagulable): substantial organ damage or vascular damage

Blood (immediately coagulates): accidentally enters blood vessels

4. Abdominal lavage

5. Laparoscopy

(5) Treatment and effects:

Primary: non-surgical treatment is the main treatment, surgery is supplemented (fasting, gastrointestinal decompression, fluid replacement, antibiotics, symptomatic)

Secondary: surgery is the main method, non-surgery is the supplement (treating the primary lesion, cleaning the abdominal cavity, and abdominal drainage)

Common complications: abdominal abscess (subphrenic abscess, pelvic abscess, interintestinal abscess) and adhesive intestinal obstruction

[Nursing Diagnosis] Group discussion and questions 3'

[Nursing Goals] Students summarize by themselves 1 '

【Nursing Measures】 15 ' Enlightenment, explanation and questions

(1) Nursing care of patients undergoing non-surgical treatment:

1. Provide psychological care
2. Observe the condition: monitor vital signs, observe abdominal conditions, and assist in examination results
3. Adopt a comfortable position: semi-recumbent position, which is beneficial to the absorption of inflammation (thinking: why?)
4. Fasting and drinking, continuous gastrointestinal decompression, and good gastrointestinal decompression care: proper fixation, maintaining smooth drainage, observation and recording, regular flushing, and indications for extubation. (Show the gastrointestinal pressure reducer commonly used in clinical practice, and then the teacher will enlighten you and explain)
5. Infusion and nutritional support
6. Follow the doctor's instructions and apply effective antibiotics in a timely manner

7. Symptomatic care: Pain relief: However, morphine, meperidine, etc. should be prohibited for patients with unknown diagnosis; pay attention to cooling down.

(2) Nursing care of patients undergoing surgical treatment:

1. Preoperative care: Be prepared before surgery

2. Post-operative care:

(1) Psychological care

(2) Recumbent position: semi-recumbent position

(3) Fasting, drinking and gastrointestinal decompression (until anal exhaust)

(4) Replenish fluids to maintain nutrition and fluid balance; use antibiotics

(5) Take good care of the drainage tube: secure it properly; keep the drainage smooth; observe and record the characteristics and amount of drainage

(6) Keep the wound dry and clean

(7) Condition observation: Observe vital signs and abdominal conditions to prevent complications (bleeding, infection, abdominal abscess, intestinal obstruction)

(8) Health guidance: get out of bed and move around as soon as possible; eat regularly; seek medical advice promptly if you experience abdominal pain, bloating, nausea, or vomiting.

Step3 : Student participation in classroom activities

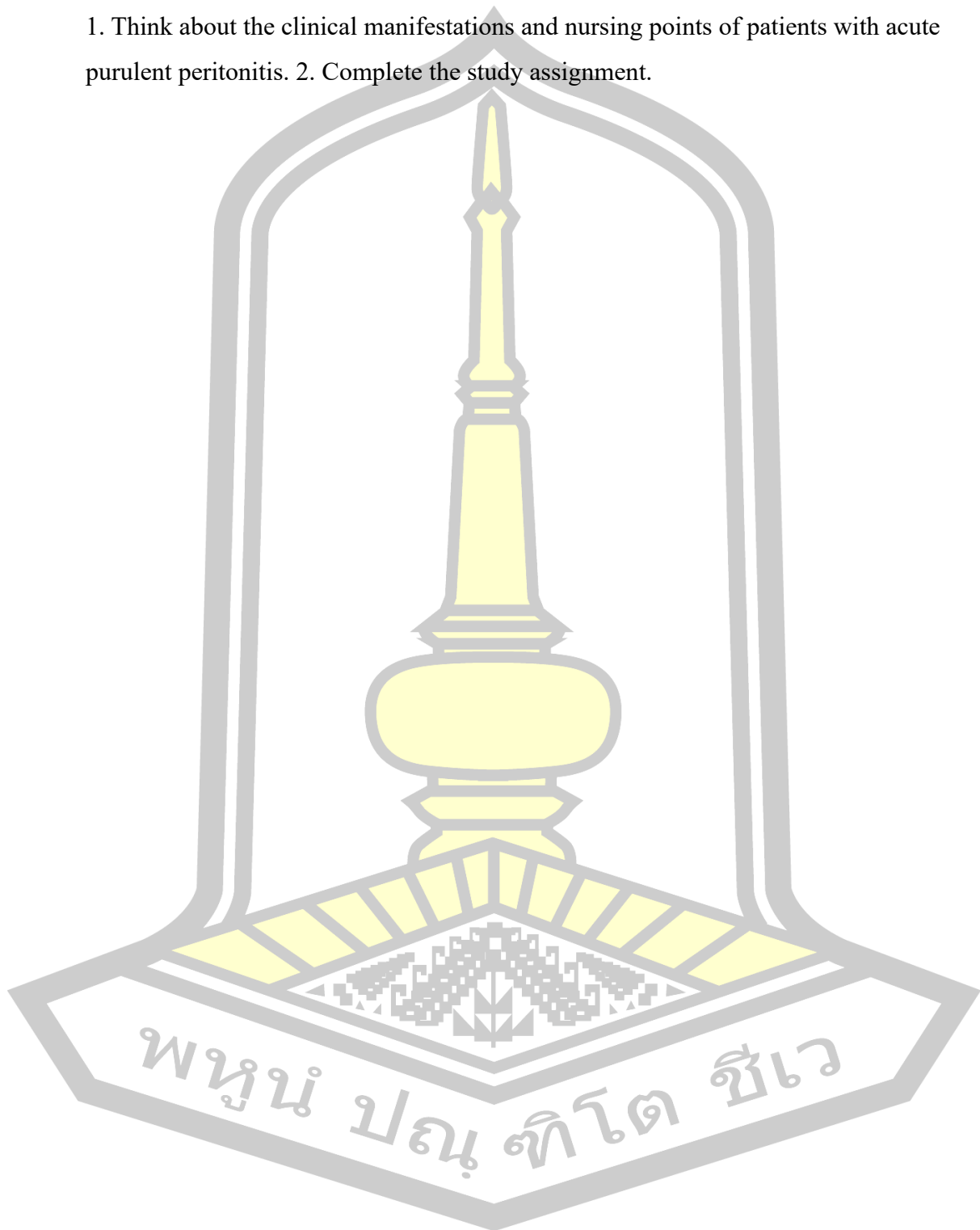
Students first think or discuss based on the questions and discussions raised by the teacher, and then. Answer proactively, share their insights and understanding, and ask the teacher if you don't understand something.

Step4 : Summary and induction(4 minutes):

1. Consolidate the content of the new lesson and emphasize the key points 2. Check questions and summarize them 3. Answer questions

Step5 : Assigning homework after class (2 minutes) :

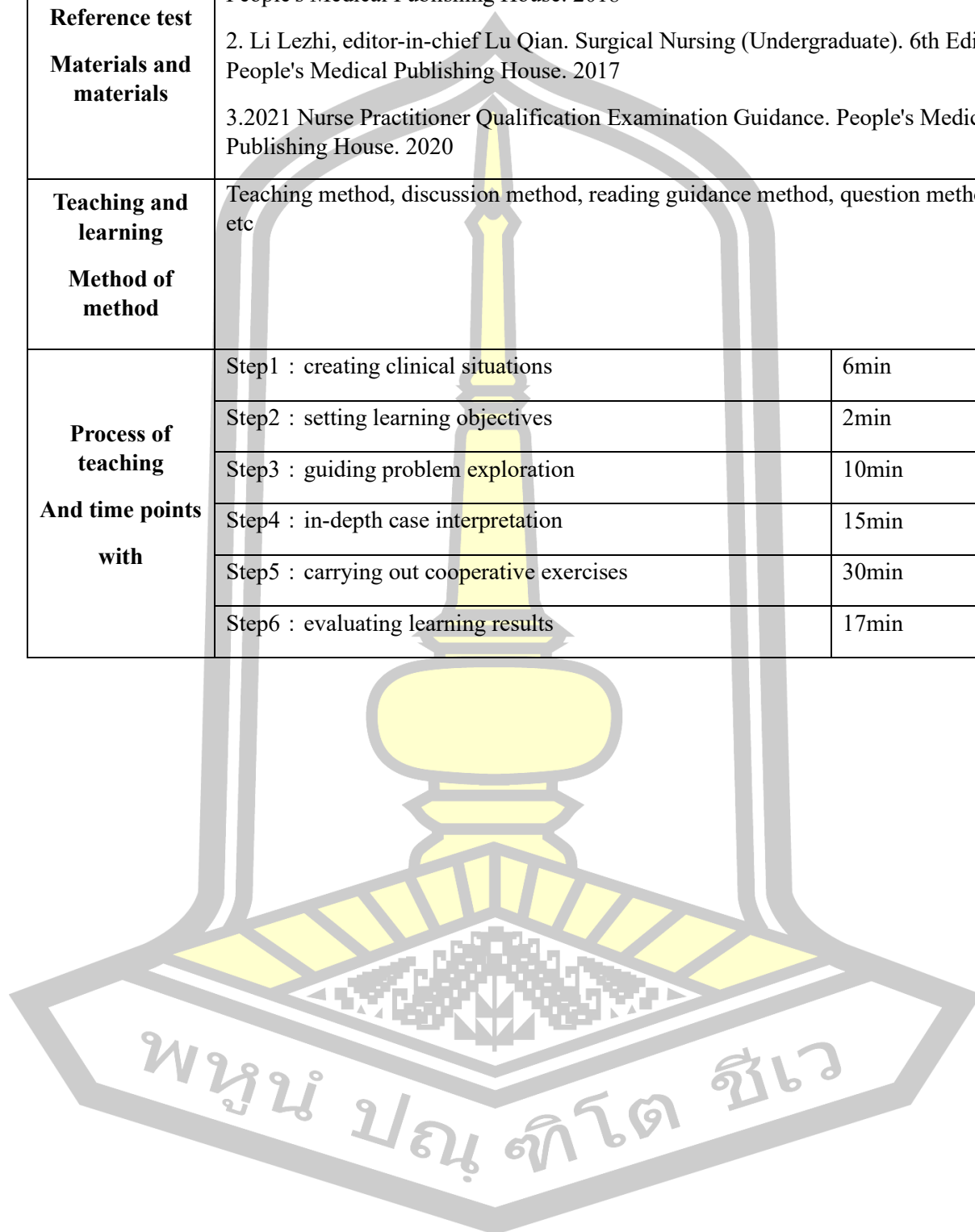
1. Think about the clinical manifestations and nursing points of patients with acute purulent peritonitis.
2. Complete the study assignment.



Nursing Care of Patients with Acute Suppurative Peritonitis(Experiential Teaching)

Name of course	Surgical nursing	Teaching dates	
Professional class		Place of delivery	
Teacher of instruction	Liu Pengfei	Director of the teaching and Research section	Pan Yan
Teaching hours	2 Credit hours	Class type	Theory and practice integrated
Teaching Topics	Item 16 Nursing care of patients with acute purulent peritonitis and abdominal injury Task 1 Nursing care of patients with acute suppurative peritonitis		
Teaching and learning Object of interest	1. Understand the physical and mental conditions, main nursing diagnosis and nursing measures of patients with acute suppurative peritonitis. 2. Be familiar with the health history, auxiliary examination, and treatment principles of patients with acute purulent peritonitis. 3. Understand the etiology and pathophysiology of patients with acute purulent peritonitis. 4. Be able to correctly assess the condition of patients with acute suppurative peritonitis and provide overall care to the patient.		
Learning situation Segregation and analysis	This class is a second-year nursing college student. They have learned knowledge about the anatomy and physiology of the peritoneum and peritoneal cavity, as well as basic nursing, introduction to nursing, health assessment and other related courses. They have also had on-the-job experience and clinical internship experience, and have basic skills. Basic professional knowledge and skills. Most students study seriously and have good understanding and logical thinking skills, but their clinical thinking in abdominal surgery specialist nursing needs further guidance. A small number of students lack initiative and enthusiasm in learning, are not good at expressing themselves, and lack self-confidence.		
Point of emphasis	The physical and mental status of patients with acute purulent peritonitis, main nursing diagnosis and nursing measures		
The hard part	Pathophysiology and nursing assessment of patients with acute purulent peritonitis		

Reference test Materials and materials	1. Edited by Chen Xiaoping, Wang Jianping, and Zhao Jizong. Surgery. 9th Edition. People's Medical Publishing House. 2018 2. Li Lezhi, editor-in-chief Lu Qian. Surgical Nursing (Undergraduate). 6th Edition. People's Medical Publishing House. 2017 3. 2021 Nurse Practitioner Qualification Examination Guidance. People's Medical Publishing House. 2020	
Teaching and learning Method of method	Teaching method, discussion method, reading guidance method, question method, etc	
Process of teaching And time points with	Step1 : creating clinical situations	6min
	Step2 : setting learning objectives	2min
	Step3 : guiding problem exploration	10min
	Step4 : in-depth case interpretation	15min
	Step5 : carrying out cooperative exercises	30min
	Step6 : evaluating learning results	17min



Teaching steps	Teaching time	Teaching link	Teaching content	Teacher activities	Student Activities
Step1 : creating clinical situations	2min	Organize teaching	Adjust the status, count the number of people	Use Xuexitong to post check-in requirements	Sign in using StudyPass
	4min	Import a new lesson:According to the diseases taught, use videos, cases, PPT, pictures and other clinical scenarios in class.	Display clinical cases of patients and create real clinical scenarios	Introduce cases, create real clinical scenarios for students, and inspire students to think	Listen carefully and take notes
Step2 : setting learning objectives	2min	Guide students to clarify learning goals and teaching arrangements, and conduct targeted learning	1. Introduce teaching objectives and important and difficult points 2.Introduce the arrangement of learning tasks	Demonstrate teaching objectives	Clarify learning goals, take notes, and prepare for subsequent studies
Step3 : guiding problem exploration	10min	Organize and guide students to explore problems	propose tasks 1: Based on this case, ask students to propose the patient's main nursing diagnosis. 2: Based on this case, students are asked to formulate specific nursing measures for this patient. 3: Think about the pathophysiological mechanism of acute peritonitis and the principles of auxiliary examination and treatment.	1.Publish learning tasks and guide students to explore problems. 2. Let the students be divided into groups to sort out the problems, and then explore the problems based on clinical practice.	1. Study independently carefully. 2. Actively discuss within the group and cooperate to complete learning tasks. 3. Speak actively, question and comment between groups. 4. Listen carefully and think positively.

Step4::in-depth case interpretation	15min	The teacher plays the role of "problem coordinator", guiding the students to express different views on the same issue by guiding the problem exploration, then organizing research and discussion, and finally summarizing and displaying the research results, sorting out the logic, and helping the students to establish a systematic knowledge system	Students discuss in groups, analyze and discuss cases based on created clinical scenarios, complete tasks, and formulate unified answers.	<ol style="list-style-type: none"> 1. Focus this section on case discussions, propose tasks, guide students to study on their own, and then discuss and cooperate in groups to complete the tasks. 2. Check and question students' completion status. 3. Comment on student performance. 	<ol style="list-style-type: none"> 1. Study independently carefully. 2. Actively discuss within the group and cooperate to complete learning tasks. 3. Speak actively, question and comment between groups. 4. Listen carefully and think positively.
Step5 : carrying out cooperative exercises	30min	Organize students to carry out cooperative exercises, so that students can "learn by doing and do in learning"	<ol style="list-style-type: none"> 1. Scenario simulation role play: Based on the theoretical knowledge learned previously, carry out scenario simulation and role play nursing measures for patients with acute peritonitis. 2. Preview within the group first and prepare for the whole class presentation. 3. After the group practice, randomly select groups to present to the whole class. 	<ol style="list-style-type: none"> 1. Guide students to divide into groups and conduct role-playing. Let the group leader assign roles, create a script, and then conduct group exercises. 2. Randomly select groups to present to the whole class. 	The group carefully discussed and completed the script creation, and then conducted scenario simulations and role plays.
Step6 : evaluating learning results	6min	Use self-evaluation, others evaluation, teacher evaluation	To conduct teaching evaluation, first conduct within-group evaluation, then conduct inter-group evaluation, and finally	Guide the teaching evaluation, first conduct within-group evaluation, then conduct inter-group evaluation, and finally the teacher provides	<ol style="list-style-type: none"> 1. Actively speak up, comment within the group, question and evaluate

			the teacher provides additional summary.	additional summary.	between groups. 2. Listen carefully and think positively.
5min	Consolidate new lessons and summarize		1. Nursing diagnosis and measures for patients with acute peritonitis. 2. Emphasize the clinical manifestations of patients with acute peritonitis.	1. Use concise language to summarize, take individual tests or ask students to answer collectively. 2. Review the preview test questions, give comments and answer questions.	Think actively, answer questions carefully, and clarify the key points of knowledge in this chapter.
5min	learning test		3 test questions to test the effectiveness of students' learning	Use XuexiTong test and comment	Use XuexiTong to actively think, answer and submit
1min	Assign homework		Complete after-class reflection questions	Assign homework and require each student to complete it carefully and independently	Listen carefully and record



Sichuan Health and Rehabilitation Vocational College Second Semester of
the 2023/2024 academic year

"Surgical Nursing" test paper

((For use by the fifth-year vocational nursing class in 2019))

Class _____ Name _____ Student ID _____

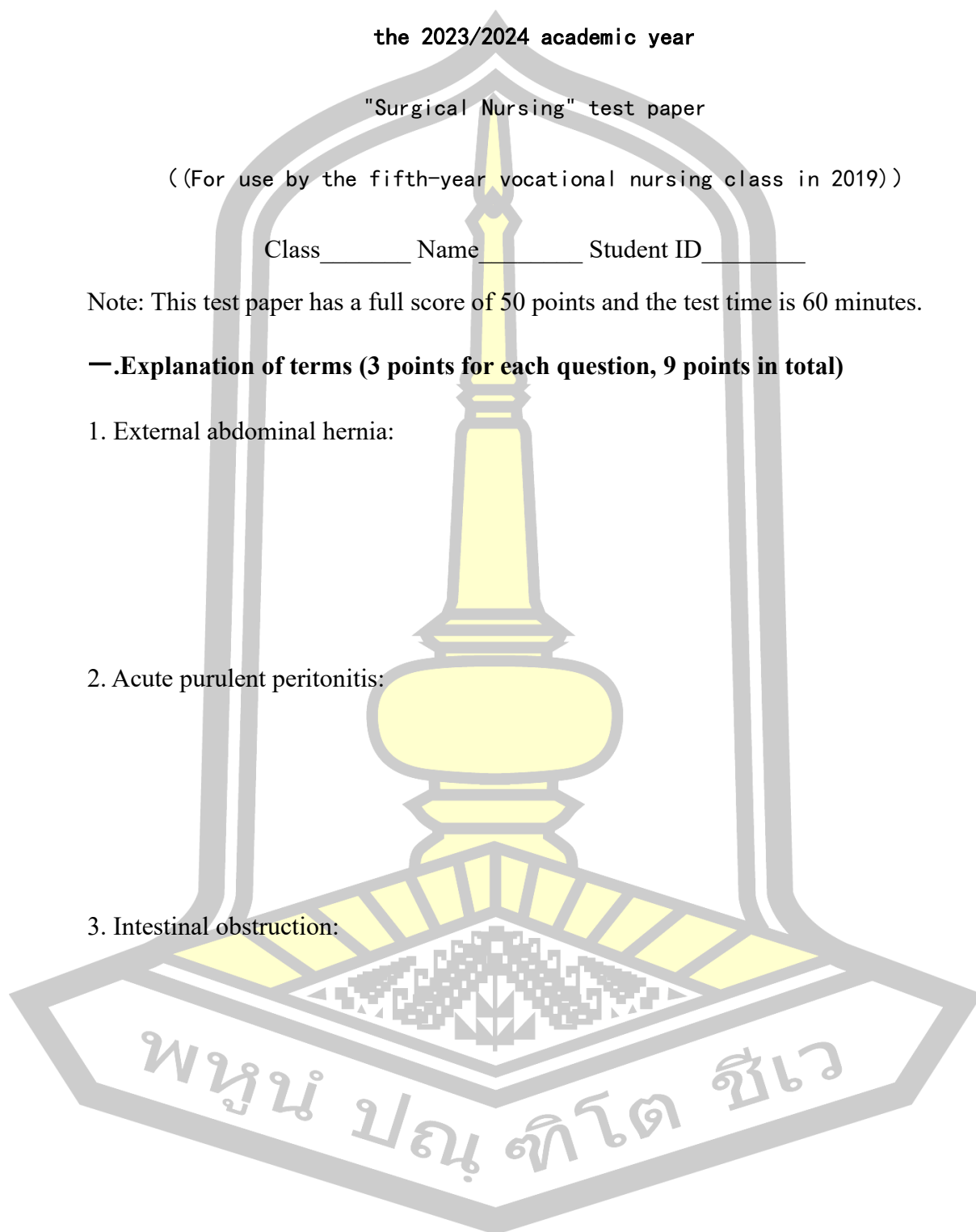
Note: This test paper has a full score of 50 points and the test time is 60 minutes.

—Explanation of terms (3 points for each question, 9 points in total)

1. External abdominal hernia:

2. Acute purulent peritonitis:

3. Intestinal obstruction:



二. Brief description questions (Question 1 is 5 points, question 2 is 6 points, total 11 points)

1. Briefly describe on-site rescue measures for abdominal injuries. (5 points)

3. Briefly describe the key points of nursing care for patients with colostomy. (6 points)

三. Case analysis (total 17 points)

1. Male, 70 years old, developed right lower abdominal pain without obvious triggers 1 year ago. A B-ultrasound examination revealed an egg-sized mass in the right lower abdomen, which was suspected to be a peri-appendiceal abscess. The abdominal pain disappeared after anti-infective treatment. After that, abdominal distension and pain occurred intermittently, and the mass in the right lower abdomen gradually enlarged; a barium enema showed a space-occupying lesion in the cecum.

The patient developed abdominal distension and distension 1 month ago, which worsened after eating and decreased flatulence. Since the onset of the disease, he has lost weight and lost 10kg in weight. The patient was admitted to the hospital as "colon tumor" from the outpatient clinic.

Please analyze:

- (1) What other tests are needed to confirm the diagnosis? (2 points)
- (2) What are the patient's current main nursing diagnoses/problems? (5 points)
- (3) If surgery is required, how to prepare the bowel? (8 points)

四. Multiple choice questions (1 point each, 15 points in total)

1. The most common clinical cause of intestinal obstruction is

- A. Intestinal roundworm obstruction
- B. Intestinal volvulus
- C. Intussusception
- D. Intestinal adhesions
- E. Intestinal tumors

2. For patients with intestinal obstruction, which of the following observations by the nurse is most correct?

- A. Early and frequent vomiting that contains bile should be suspected of high intestinal obstruction.
- B. Projectile vomiting indicates paralytic intestinal obstruction
- C. The abdominal pain is relieved and the bowel sounds are no longer loud, indicating that the obstruction has been relieved.
- D. Abdominal pain turning into persistent distending pain indicates strangulating intestinal obstruction.
- E. The patient has a bowel movement, which indicates incomplete intestinal obstruction.

3. What is the correct preoperative care for patients with intestinal obstruction?

- A. Give a liquid diet to promote intestinal peristalsis
- B. Give analgesics to relieve abdominal pain symptoms
- C. Give laxatives to relieve obstruction
- D. Fasting and gastrointestinal decompression
- E. Apply hot compress to the abdomen to relieve abdominal pain

4. What is vascular intestinal obstruction?

- A. Intestinal spasm
- B. Intestinal tumors
- C. Mesenteric thrombosis
- D. Peritonitis
- E. Intestinal volvulus

5. The general position of patients with intestinal obstruction when their condition is relatively stable is

- A. Supine position

B. Lie on your back with your head turned to one side

C. Semi-recumbent position

D. Side decubitus position

E. Head down position

(Questions 6-8 share the same question stem) Male, 55 years old. I have been suffering from chronic constipation for many years and I have to strain every time I have a bowel movement. In the past six months, it was discovered that a pear-shaped mass appeared in the scrotum when standing, which could be reduced when lying down. After local examination and palpation, it was found that the outer ring was enlarged. The patient was asked to cough and there was an impact feeling on the fingertips. The fingers pressed on the inner ring and he stood up and coughed. The mass no longer appeared. External abdominal hernia was diagnosed and surgical treatment was planned.

6. The most important preoperative care to avoid postoperative hernia recurrence is

A. Treat constipation

B. Preparing skin

C. Urination

D. Enema

E. Medication before anesthesia

7. What are the inappropriate postoperative care measures?

A. Supine position

B. Keep the dressing clean and dry

C. Hold up the scrotum and compress the wound with sandbags

D. Drink more water and eat more fruits

E. Encourage the patient to get out of bed early and move around

8. Postoperative health education content, the most important thing is

- A. Increase nutrition
- B. Regular review
- C. Appropriate exercise
- D. Keep the wound clean
- E. Avoid heavy physical labor within 3 months

9. The most important cause of morbidity related to external abdominal hernia is

- A. Chronic cough
- B. Long-term constipation
- C. Difficulty urinating
- D. There are weak points or abdominal wall defects in the abdominal wall
- E. Frequently engage in work that increases intra-abdominal pressure

10. After hernia repair surgery, the main purpose of sandbags to compress the wound is

- A. Avoid wound dehiscence
- B. Prevent scrotal hematoma
- C. Prevent wound infection
- D. Prevent recurrence of hernia
- E. Prevent the dressing from falling off

11. The abdominal external hernia that is most likely to become incarcerated is

- A. Indirect inguinal hernia
- B. Umbilical hernia
- C. Direct inguinal hernia

D. Femoral hernia

E. Incisional hernia

12. The most significant difference in evaluating direct inguinal hernia and indirect hernia is

A. Shape of hernia mass

B. Age of onset

C. Degree of incarceration

D. Retract the hernia mass to compress the inner ring and increase abdominal pressure to see if the mass reappears.

E. Location of the mass

13. Which of the following is the cause of primary peritonitis?

A. Acute perforation of gastric and duodenal ulcers

B. Abdominal visceral injury

C. Acute appendicitis perforation

D. Pathogens enter the abdominal cavity through blood.

E. Strangulating intestinal obstruction

14. The main sign of acute peritonitis is

A. Bowel sounds weaken or disappear

B. Tenderness and rebound pain, abdominal muscle tension

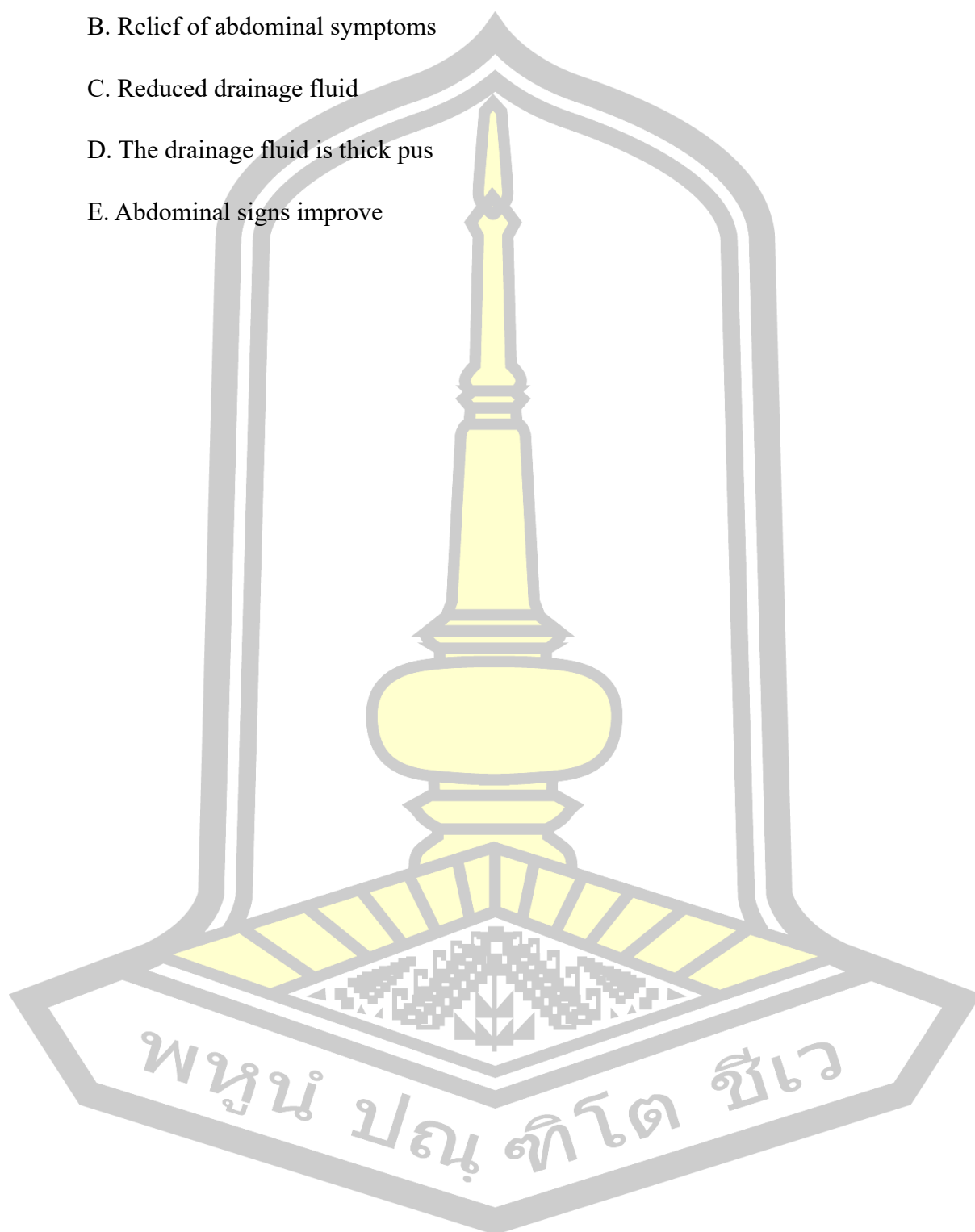
C. Moving dullness

D. The boundary of liver dullness shrinks or disappears

E. Palpable mass with tenderness

15. Exclusion of indications for extubation of abdominal drainage tube after peritonitis surgery

- A. General situation improves
- B. Relief of abdominal symptoms
- C. Reduced drainage fluid
- D. The drainage fluid is thick pus
- E. Abdominal signs improve



Teaching plan

Teaching Plan of Sichuan Health Rehabilitation Vocational College

Course name: surgical nursing Instructor : Liu Pengfei, Professional title : Lecturer

Nursing 2019 5-year higher vocational education 3-6 Class 2023/2024 Academic Year Second Semester

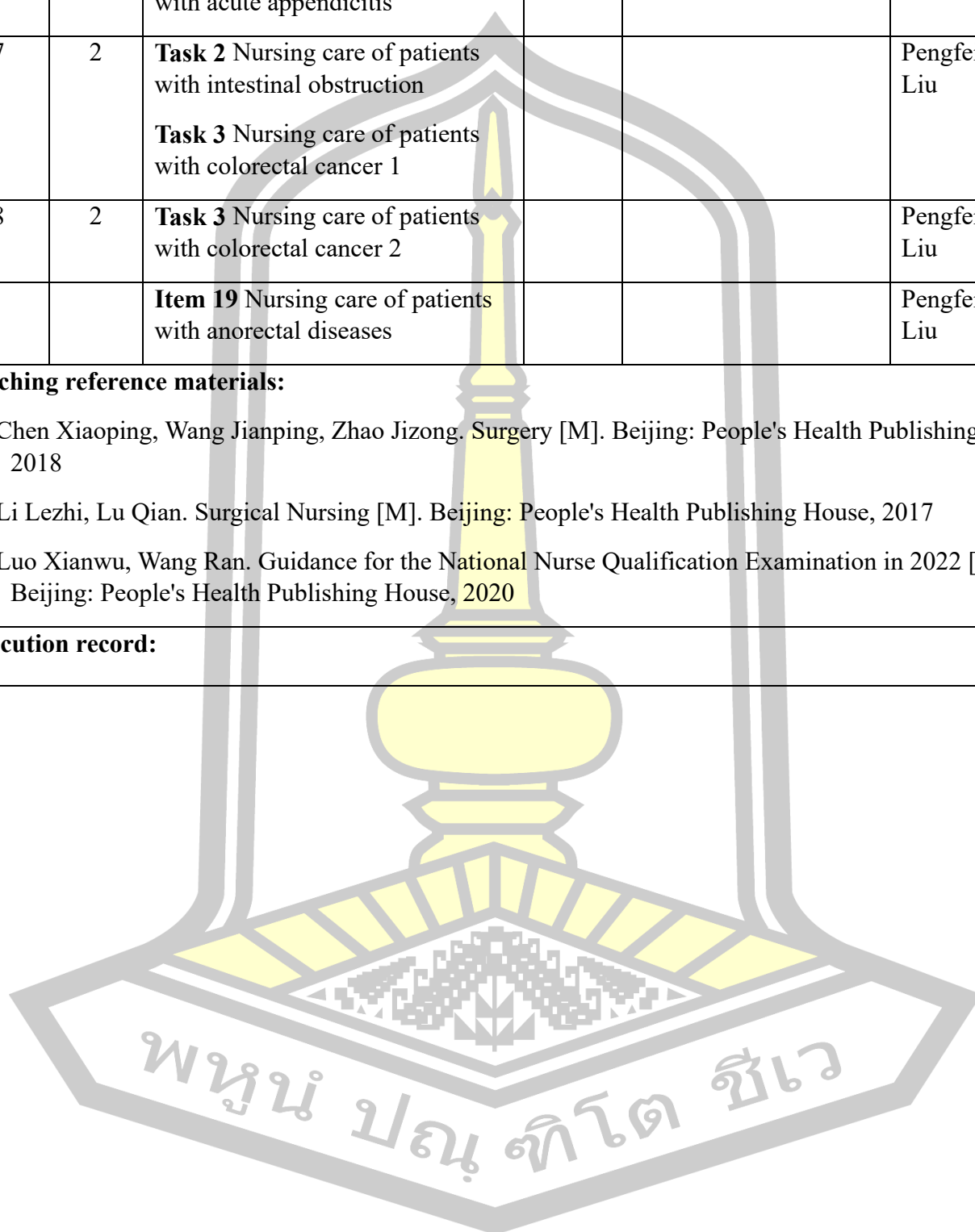
Weeks	Theory class		Practice class		Teacher	remark
	Credit hours	Teaching content	Credit hours	Teaching content		
1	2	Item 16 Nursing care of patients with acute suppurative peritonitis and abdominal injury Task 1 Nursing care of patients with acute suppurative peritonitis			Pengfei Liu	
2	2	Task 2 Nursing care of patients with abdominal injury			Pengfei Liu	
3	2	Item 15 Nursing care of patients with abdominal external hernia			Pengfei Liu	
4			2	Practice 1: Nursing care of patients with abdominal injury (case discussion)		
5	2	Item 17 Nursing care of patients with gastroduodenal diseases Task 1 : Nursing care of patients with gastroduodenal ulcer Task 2: Nursing care of patients with gastric cancer			Pengfei Liu	
6	2	Item 18 Nursing of patients with intestinal diseases			Pengfei Liu	

		Task 1 : Nursing care of patients with acute appendicitis				
7	2	Task 2 Nursing care of patients with intestinal obstruction Task 3 Nursing care of patients with colorectal cancer 1			Pengfei Liu	
8	2	Task 3 Nursing care of patients with colorectal cancer 2			Pengfei Liu	
		Item 19 Nursing care of patients with anorectal diseases			Pengfei Liu	

Teaching reference materials:

- [1] Chen Xiaoping, Wang Jianping, Zhao Jizong. Surgery [M]. Beijing: People's Health Publishing House, 2018
- [2] Li Lezhi, Lu Qian. Surgical Nursing [M]. Beijing: People's Health Publishing House, 2017
- [3] Luo Xianwu, Wang Ran. Guidance for the National Nurse Qualification Examination in 2022 [M]. Beijing: People's Health Publishing House, 2020

Execution record:



Learning Attitude Questionnaire

Dear classmates:

Hello! Thank you very much for participating in this survey. This questionnaire is mainly used to investigate the learning attitudes (school learning) of five-year vocational students under different teaching methods in these two months. The objective and complete information you provided is mainly used for research on the learning attitudes of five-year higher vocational students. Therefore, we sincerely hope to get your true answer. The questionnaire is anonymous and the answers are neither right nor wrong and will not have any adverse impact on you or your teacher. Please select the option that best suits your situation and select one of completely disagree, basically disagree, somewhat agree, basically agree and completely agree by ticking (✓). All questions are single-choice questions. thank you for your cooperation!

Basic information about you:

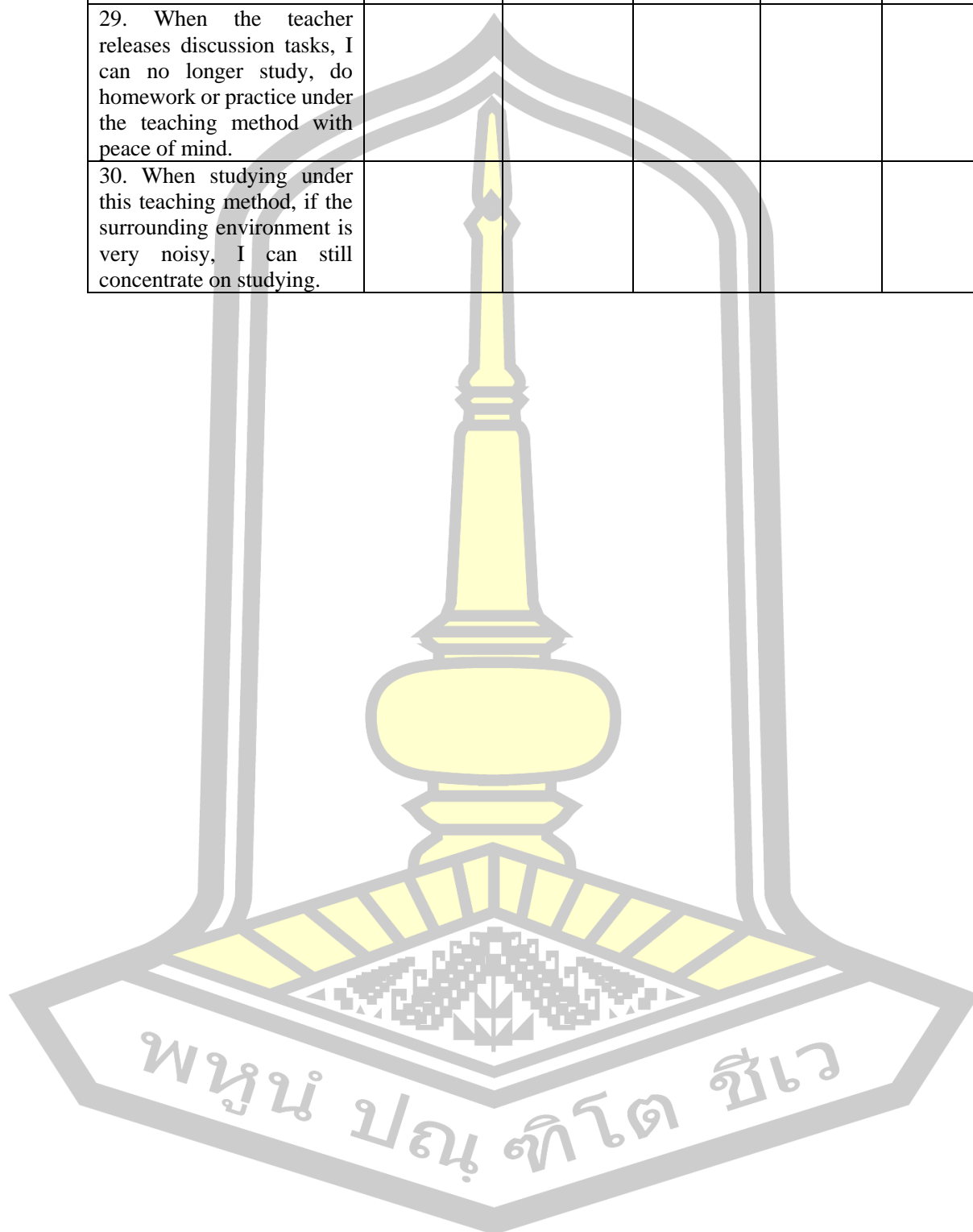
1. Your class: ① Grade 19 Vocational Nursing Class 5 ② Grade 19 Vocational Nursing Class 6
2. Gender: ① Male ② Female
3. Whether you are a class committee cadre: ① Yes ② No

project	Totally disagree	Basically disagree	Somewhat Agree	Basically agree	Totally agree
1. I think learning under this teaching method is very important for my future.					
2. When studying under this teaching method, I want to work hard to obtain excellent academic results.					
3. I will be happy if I don't have to study under this teaching method for a few days due to illness.					
4. If I encounter a problem that I don't understand during class under this teaching method, I will ask the teacher or classmates for help after class.					
5. During the study period under this teaching method, I must study under the supervision of the teacher.					
6. When taking exams or exercises following this teaching method, I peeked					

at books or looked up answers online.					
7. During the learning period of this teaching method, I can concentrate on studying at the scheduled time and stop doing other things.					
8. If you encounter problems that are difficult to understand when learning this teaching method, you will not want to continue learning.					
9. After learning this teaching method, I played first, and finally had to do my homework, and even forgot to do my homework.					
10. During my study of this teaching method, I will ask myself questions while reading.					
11. I think students should learn each subject well.					
12. I think the poor academic performance under this teaching method is the result of not studying hard.					
13. Because I am worried that I will be criticized by teachers and parents if I don't participate in the teaching method, I have to participate in the study.					
14. During the study of this teaching method, if I encounter a problem that I do not understand, I will try my best to understand the problem.					
15. When learning this teaching method, I can concentrate on listening.					
16. During the study period under this teaching method, after the teacher announces the answers to exercises or exams, I will carefully check the questions I got wrong.					

17. During the period of learning this teaching method, I have a good study plan.					
18. If you feel that you are having difficulty in learning, you no longer want to study with this teaching method.					
19. Because of playing, playing with mobile phones or TV, I will forget the learning tasks assigned by the teacher during the class of this teaching method that day.					
20. When reviewing after class, I will recall again what the teacher taught under this teaching method to strengthen my memory.					
21. I think it doesn't matter whether a person goes to school or not.					
22. For chapters with poor academic performance, I will study diligently and improve my performance.					
23. When learning this teaching method, I feel tired and want to sleep as soon as I pick up the book.					
24. I feel that I am not smart and it is useless no matter how hard I try.					
25. I will review the new content I just learned in the class using this teaching method.					
26. During the learning period of this teaching method, I was more nervous than usual before the exam and spent more time reviewing my homework.					
27. During the study period of this teaching method, I made a study plan, but I often could not complete it as planned.					
28. During the period of learning this teaching method, when doing homework, I didn't want to					

do the questions I didn't know how to do.					
29. When the teacher releases discussion tasks, I can no longer study, do homework or practice under the teaching method with peace of mind.					
30. When studying under this teaching method, if the surrounding environment is very noisy, I can still concentrate on studying.					





FACULTY OF EDUCATION
MAHASARAKHAM UNIVERSITY

79/2 Muang, Maha Sarakham,
44000, THAILAND
Tel/fax +66 43 713 174
Email: cia.edu@msu.ac.th

MHESRI No. 0605.5 (2) /CL453

Date: February 1, 2024

To: Professor Li Cai,
Sichuan Vocational College of Health and Rehabilitation
Professor Jiamei Liu,
Sichuan Vocational College of Health and Rehabilitation
Professor Yan Pan,
Sichuan Vocational College of Health and Rehabilitation
Professor Ling Xu,
Sichuan Vocational College of Health and Rehabilitation
Professor Jinmei Zou,
Sichuan Vocational College of Health and Rehabilitation

Subject: Thesis Reviewer Invitation

Our student, **Mr. Pengfei Liu**, student ID **64010558010** majoring in the **[Program/Major]** program is currently undertaking a research project titled "**Learning Achievement and Attitude toward Surgical Nursing Learning between Experiential Teaching and Traditional Teaching for Vocational College of Health Rehabilitation in Sichuan Province, China**" under the guidance of Asst. Prof. **Kanyarat Sonsupap**.

To ensure the successful execution and the highest quality of this research project, we are seeking your valuable expertise and experience. Therefore, I am delighted to extend a formal invitation to you to serve as a reviewer for the research instrument designed for this thesis project.

Your participation in this academic endeavor is highly valued and appreciated. Should you require any further information or have questions regarding this invitation, please do not hesitate to contact us by email.

Best Regard,

Assoc. Prof. Chowwalit Chookhampaeng
Dean, Faculty of Education,
Mahasarakham University



FACULTY OF EDUCATION
MAHASARAKHAM UNIVERSITY

79/2 Muang, Maha Sarakham,
44000, THAILAND
Tel/fax +66 43 713 174
Email: cia.edu@msu.ac.th

Student Permission Letter

This permission letter serves to

Student name: Mr. Pengfei Liu

Student ID: 64010558010

Program: Master of Education in Curriculum and Instruction

The mentioned student has been registered as a student pursuing a Master's Degree in Curriculum and Instruction at the Faculty of Education, Mahasarakham University, Thailand. To fulfill the program requirements, the student is required to make significant progress on their thesis. This letter serves to formally offer the student the opportunity to undertake their thesis research abroad, contingent upon the research being directly aligned with their approved research topics.

The details of the data collection of Mr. Pengfei Liu are as follows:

Thesis title: Learning Achievement and Attitude toward Surgical Nursing Learning between Experiential Teaching and Traditional Teaching for Vocational College of Health Rehabilitation in Sichuan Province, China

Location of data collection: China

The period of data collection: From May 24, 2024 to July 23, 2024

The student's thesis project, under the guidance of Asst. Prof. Kanyarat Sonsupap requires the collection of data abroad due to the specific population and sample group that is essential for their research. We acknowledge that the student has made the necessary preparations, including obtaining the Thesis title approvals from our institution.

Should you require any further clarification or information regarding the student's academic record, please do not hesitate to contact our office at your convenience.

Issued on May 1, 2024

Assoc. Prof. Chowwalit Chookhampaeng
Dean, Faculty of Education,
Mahasarakham University

BIOGRAPHY

NAME Mr.Pengfei Liu

DATE OF BIRTH September 12,1988

PLACE OF BIRTH China

ADDRESS Gongjing District, Zigong City, Sichuan Province

POSITION Gongshan No.1 Building 45

PLACE OF WORK Sichuan Health Rehabilitation Vocational College

EDUCATION 2004-2007 Sichuan Rongxian Yuzhang senior middle school
2007-2008 Sichuan Rongxian senior middle school
2008-2012 Zunyi Medical College nursing major
2021-2024 Master of Education, Curriculum and Instruction, Faculty of Education, Mahasarakham University

