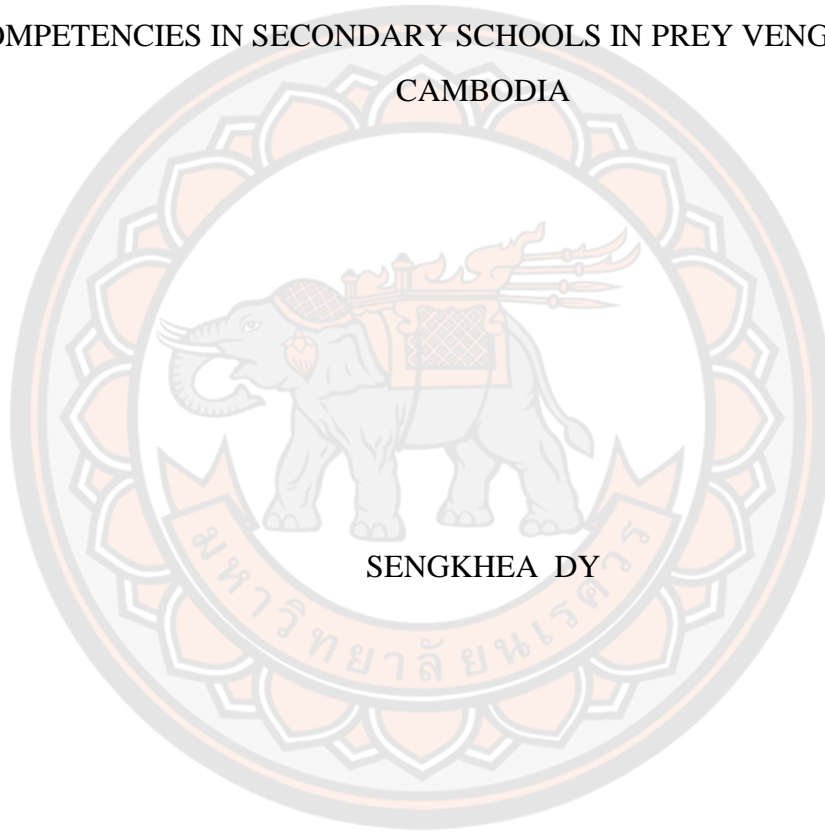THE STATES AND GUIDELINES FOR IMPROVING TEACHERS'
COMPETENCIES IN SECONDARY SCHOOLS IN PREY VENG PROVINCE,
CAMBODIA

SENGKHEA DY

A Thesis Submitted to the Graduate School of Naresuan University
in Partial Fulfillment of the Requirements
for the Master of Education in Educational Administration
2021

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Thesis entitled "THE STATES AND GUIDELINES FOR IMPROVING TEACHERS' COMPETENCIES IN SECONDARY SCHOOLS IN PREY VENG PROVINCE, CAMBODIA"

By SENGKHEA DY

has been approved by the Graduate School as partial fulfillment of the requirements

for the Master of Education in Educational Administration of Naresuan University

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Title	THE STATES AND GUIDELINES FOR IMPROVING TEACHERS' COMPETENCIES IN SECONDARY SCHOOLS IN PREY VENG PROVINCE, CAMBODIA
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Academic Paper	M.Ed. Thesis in Educational Administration, Naresuan University, 2021
Keywords	Cambodia Secondary School Teachers' Competencies

ABSTRACT

The objectives of the research were (1) to study and compare the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia, and (2) to study guidelines for improving and enhancing teachers' competencies in Prey Veng province, Cambodia.

This research consisted of two main steps. In the first stage, studying the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia by distributing questionnaire form to 248 secondary school teachers who were teaching staff working in schools in the academic year 2021. And in the second stage was to study the guidelines for improving and enhancing teachers' competencies in secondary schools by using a semi-structured interview form to interview 3 educational experts who had experience of more than 10 years in the field of teacher training and development. The qualitative and quantitative research approaches were used by the researcher to gather data and then analyzed it through statistical analysis.

The questionnaire was the instrument employed in this research. The researcher utilized a 5-rating scale as the response format. The frequency, percentage, arithmetic mean, standard deviation, and t-test independent were used for analyzing gathered data.

The research results were shown as the following:

1. The overall result of the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia showed at a high level.

2. The overall result of the comparison of the current state of teachers' competencies in schools as classified by gender and level of degree of teachers showed that there were no significant differences.

3. The findings of studying guidelines for improving and enhancing teachers' competencies had been found imperative and effective to improve and enhance teachers' competencies in secondary schools, Cambodia.

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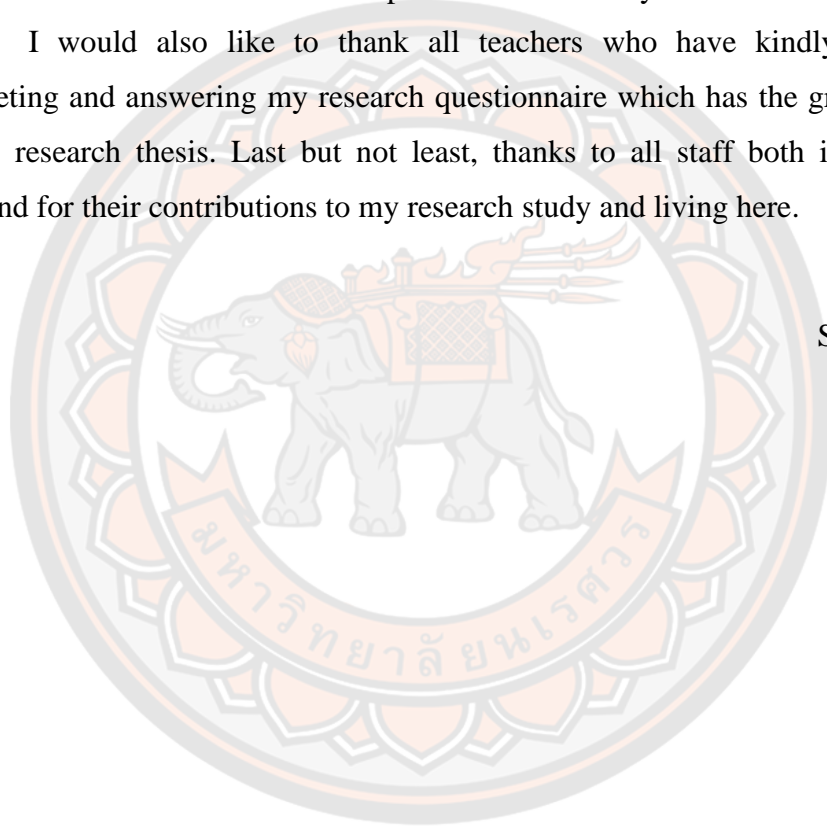
I also extend my special thanks to Dr. Kimcheang Hong, director of Kampong Speu Institute of Technology, who has provided priceless time as the expert in checking and advising my research instrument and also allows me to interview him. Special thanks to Mr. Sothin Ly, who is the deputy-director of Prey Veng Regional Teacher Training Center, and Dr. Sok Soth, who is Dean of Faculty of Education, Royal University of Phnom Penh, Cambodia who have provided invaluable time for me to

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ABBREVIATIONS

HRD	Human Resource Development
HRM	Human Resource Management
INSET	In-service Teacher Training
MoEYS	The Ministry of Education Youth and Sport
NIE	The National Institute of Education
PDCA	Plan Do Check and Action
PRESET	Pre-service Teacher Training
PSTTC	Pre-School Teacher Training College
PTTC	Provincial Teacher Training Center
RGC	The Royal government of Cambodia
RTTC	Regional Teacher Training Center
TPAT	The Teacher Policy Action Plan
WHO	World Health Organization
PLC	Professional Learning Community
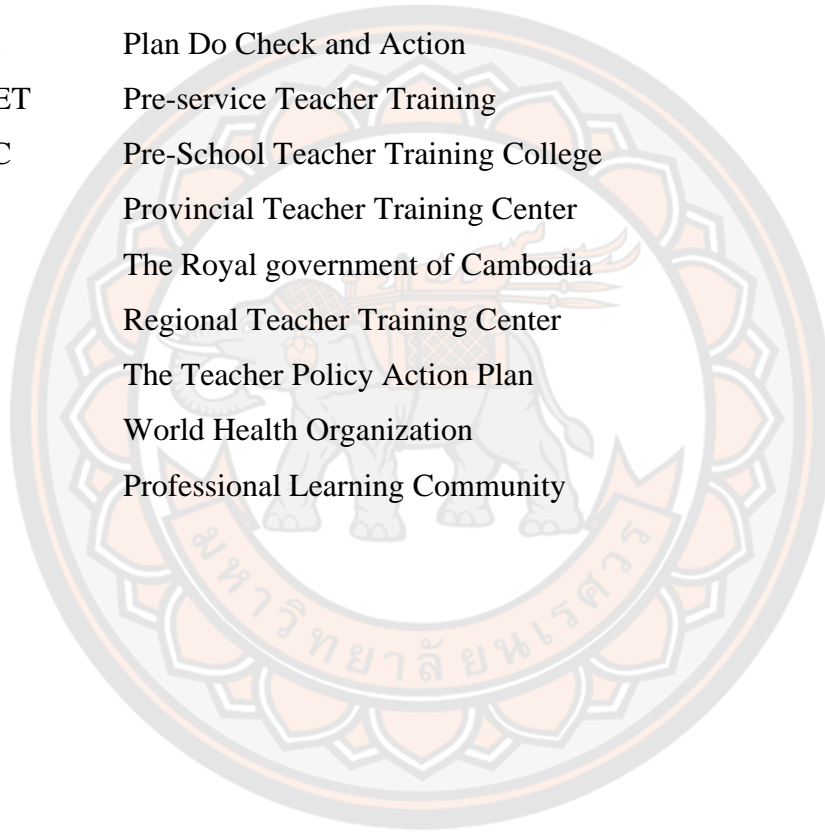
CHAPTER I

INTRODUCTION

The rationale of the Study

Education is a central element in the public biography of individuals, greatly affecting their life chances. It is also a central element in the table of organization of society, constructing competencies and helping create professions and professionals. It has an impact on society. Through education, school processes individuals to possess the appropriate knowledge and socializing experiences which prepare them to act and have access to valued positions in society (Sadovnik, & Coughlan, 2016). Doumbia (2013) defined education as the way of acquiring knowledge. He stated that it is not only built our knowledge and competency but also affects the way we think such as fabricating opinions, spreading our thoughts, having a perspective of life, teaches us the life lesson which allows us to be owned and can shape it. He emphasizes that without education information cannot be transformed into knowledge. Based on him education inspires people capable of defining things, among other things. So that is the reason why education should be provided for all.

To respond to the demands of the new century, the establishments of world's education are the basic to develop effective future leaders possessing the knowledge and skills needed to deal with technology and people, complex societal issues, real-life problems, and especially a focus on values that will inspire others with virtue. The success of higher education systems worldwide in producing scholars and leaders responsible for unprecedented technological development, scientific discoveries, economic growth, artistic achievements, and human aspiration. These were accomplished with the collaboration among professionals of many fields and the integration of their knowledge and skills across disciplinary and national boundaries(Wang et al., 2002). According to WHO (1998), education is the foundation for the future success of the young, as without education the potential for individual development is drastically reduced. Education is the key to simultaneously reducing common health problems; increasing the efficiency of the education system; and thus, advancing public health, education, social and economic development.

Hanushek, & Wößmann (2007) stated that education plays a fundamental role in promoting economic well-being. It builds the cognitive skills of the population that are powerfully related to individual earnings, the distribution of income, and economic growth. They stated that through education there are at least three mechanisms that may affect economic growth such as (1) education increases the human capital inherent in the labor force, which increases labor productivity and thus transitional growth towards a higher equilibrium level of output; (2) education may increase the innovative capacity of the economy, and the new knowledge on new technologies, products and processes promote growth; and (3) education may facilitate the diffusion and transmission of knowledge needed to understand and process new information and to successfully implement new technologies devised by others, which again promotes economic growth. That is why education is taken a central part in most development strategies. With qualified education economic conditions have guaranteed improvement.

Education is a basic function of government everywhere in the world. Education systems can serve many other purposes as well-with far-reaching consequences for societies, their citizens, and the governments that operate them. Education can be a means of boosting human capital and economic growth. Education, then, is an institutional arena of enormous potential, a shaper of the fundamentals of human society. Precisely because this is so, governments have strong incentives to put this potential to use by getting actively involved in the design, control, and operation of education systems for their societies- and these systems, as a result, cannot help but be profoundly influenced by the political process through which governmental decisions get made (Moe, & Wiborg, 2017).

Human Resource Development is considered by The Royal Government of Cambodia (RGC) as the priority of the Rectangular Strategy since the first phase and became the top priority in phases 3 and 4. Because it acts as the foundation for improving general education, vocational and competence skills, entrepreneurship, creativity and innovation, virtue, morality, patriotism, and sense of responsibility, women's roles and social protection, and a healthy lifestyle. The RGC's strategic objective is to develop a **"quality, equitable and inclusive education system"** with a

focus on science and technology, labor market orientation, and physical education to support national socio-economic development (RGC, 2018).

To reach Cambodia Vision 2050 the RGC of the sixth Legislature introduced Rectangular Strategy-Phase IV to respond to two historic missions of the nation, firstly, striving forward with a firm belief to fully achieve sustainable development goals; and secondly, creating necessary pre-conditions and environment conducive for laying the strong foundation to become an upper-middle-income country by 2030 and for the in-depth transformation of Cambodia into a high-income country by 2050.

Through this vision, the Ministry of Education, Youth, and Sport (MoEYS) are committed to achieving its first goal of, "Improving the Quality of Education, Science and Technology" by focusing on seven reform priorities: 1) teachers, 2) expansion of schools at all levels, 3) strengthening comprehensive inspection of school management, 4) promotion of technical education at upper secondary education, 5) skills education following the labor market, 6) development of comprehensive curricula and textbooks, and 7) preparation for the Southeast Asian Games 2023.

For the next five years (2019-2023) and towards 2030 and 2050, MoEYS is committed to achieving Sustainable Development Goal 4 on Education, based on the principles of inclusive, equitable, and quality education and promoting lifelong learning opportunities for all. MoEYS continues to minimize skills gaps by collaborating with relevant stakeholders to intensify the supply of skills training in priority areas, and by introducing digital education in response to policy and the direction of Cambodia's digital economy (MoEYS, 2019)

Thus, in early 2014, the Ministry of Education, Youth and Sport starts to reform Cambodian education to ensure that students are equipped with relevant knowledge and skills necessary for supporting anticipated economic structure in 2030 and 2050 and for engaging in the global labor marketplace. The current education reforms are the reflection of Cambodia's endeavor to move towards excellence in education and human capital development to achieve success in an economic dream. The reforms embrace 5 main pillars comprising (1) the implementation of Teacher Policy Action Plan, (2) the revision of curriculum, textbooks, and school environment, (3) the implementation of the inspection system, (4) the enhancement of

student learning assessments (for example, national examinations, national, regional and international student learning assessments), and (5) higher education reform (MoEYS, 2018).

Teachers are played as a central role in imparting knowledge and helping students' growth. Révai (2018) stated that being a teacher as a professional is needed for educational quality because it is affected students' minds and growth but it is not an easy matter. So, what makes good teaching? Based on him teacher must be capable of planning a lesson and managing a classroom, effectively using teaching methods that facilitate students' learning and growth, understanding how students learn, how to apply the knowledge, establishing good relationships, and motivating them to progress. He stated that good teaching certainly relies on teachers' motivation. That is why many countries have been trying to fabricate the characteristics of good teaching and design policies to promote them, developing teaching standards-or descriptions of what teachers, as professionals, are required to know and be able to do. Standards should be engaged to the entire teaching profession, teacher education and professional development programs, and course outcomes. And allow them to reflect on what great teaching is.

According to the Ministry of Education of Singapore (2020) teachers are mentors and role models to their students. In Singapore, teachers do not only transmit knowledge, skills, thoughts but they also act a crucial role in shaping and inspiring students' minds, growing moral values, and making them sociable through teachers' actual speech and performance. These are essential to advance their full potential and enable them to the fast-changing world and become good citizens. To accomplish this, the Ministry of Education (MoE) is taken part and committed to building up their teachers' competencies to become professionals so that they can be better guide students to grow. Teachers, to take their students to become good citizens, pledge that "they will guide and bring out the best to students; model them in the discharge of duties and responsibilities, continue lifelong learning and pass it to students which are motive to motivate them to love learning; and getting trust, support and cooperation of parents and the community which enables them to achieve a mission.

Cooper, & Garner (2012) stated that teachers who connect with their students create a safe environment where students can question, explore, and discover. Willingness to take risks can be limited by a fear of failure. A safe environment governed by principles that encourage growth and respect allows students the freedom to learn from their mistakes. Teachers need to connect with kindness while maintaining appropriate boundaries. To build meaningful relationships, teachers need to know who they are, know their students, be competent in their content area, and be proficient in their ability to engage students in learning.

According to Tandon and Fukao (2015a) stated that a high-quality teacher is the root of all high-performing education systems and the single most important factor in improving student learning. Teachers are the largest element of Cambodia's education and the most important determinant of school quality. They stated that the quality of teachers is closely connected to student learning and achievement. As result, students with a poor teacher master 50 percent or less of the curriculum for that grade; students with a good teacher achieve an average gain of one year, and students with great teachers advance 1.5-grade levels or more. These effects lead to unbridgeable gaps in student learning. By upgrading its teaching force quality, Cambodia can raise student achievement substantially.

In the modern dynamic society, the role of teachers changes from instructor to facilitator, problem poser, catalyst, organizers of learning experiences, and the harbinger of a sea of changes. To acquire these, in-service training (a common mane referring to any training programs organized for in-service teachers), has been designed with clear objectives to promote teachers with continuous improvement, life-long learning/process aiming at expanding/increasing knowledge, stimulating attitude, and imparting skills related to a particular job. In-service training, teachers have an opportunity to learn new ideas, methods, and techniques to keep abreast of changing world and review their pedagogic skills to multiply their potential to enhance institutional as well as individual development. So, a teacher should become a learner from time to time by keeping alive and fresh (Reddy, 2007).

Teaching is a continuing process, requiring constant capacity-building exercises. The capacity building training is even more indispensable in the current context of teacher education reform in Cambodia where the teacher training

modalities have not been standardized on par in line with the regional or international practice where the pre-service teacher training (PRESET) is meant to equip K-12 teachers to have a least a bachelor's degree and the in-service teacher training (INSET) is meant to update teachers' professional knowledge and skills and to enable them to better fit into the global teaching and learning environment. Cambodia is on this track, aiming to reemphasize both PRESET and INSET in the teacher reform agenda, as articulated in the Teacher Policy Action Plan (TPAP) (Fata, & Kreng, 2017).

Fata, & Kreng (2017) did a survey report on "Teachers and teaching profession in Cambodia" by capturing a range of capacity-building activities asked teachers as to whether they have attended specific training activities thus far. Based on their study there are more than half of teachers could not receive or participate in most of the capacity training activities. They stated that the participation of teachers in research-related training presented a crucial turning point in teaching modalities (from teacher-dependence to teacher-independence), unfortunately, the sizable number of teachers did not have a chance to engage in further education or training raised a major concern over the capacity development of teachers and a critical setback in teaching and learning quality. MoEYS (2019) showed that the dropout rate for the lower secondary school declined significantly, from 21.2 percent in SY 2013/14 to 15.4 percent in SY 2017/18. However, this rate is still high due to other factors such as schools being far from houses, and lack of qualified teachers, core textbooks, teaching methods, and scholarships.

During the reconstruction period, the number of trained primaries and lower secondary school staff increased gradually and consistently, with an increased share of the teaching force holding upper secondary education or graduate qualifications. According to her, about a quarter of primary school teachers hold an upper secondary degree, while about two-thirds hold a lower secondary school degree. Almost two-thirds of secondary teachers have completed at least grade 12, while 18 percent had some post-secondary education. Although these numbers appear astoundingly low, they represent considerable improvement considering. Despite numerous MoEYS policies designed to strengthen teaching quality, in-service training has remained largely insufficient and professional development opportunities have been relatively

scant. Only 15 percent of lower secondary school teachers report having attended an in-service training session during the 2005/06 academic year, regardless of school type. Given that low compensation is a primary demotivating factor, attending professional development activities may not be a high priority among educators (UNESCO, 2011).

This study aims to study the current states and problems of teachers' competencies in secondary schools in Prey Veng Province, Cambodia. And to study guidelines for improving teachers' competencies in secondary schools in Cambodia. This study will be a resource for policymakers to use for developing the teachers' competencies in Cambodia that is affected on developing the human resources and quality of education in Cambodia.

Research Question

1. What are the states of teachers' competencies in secondary schools in Prey Veng province, Cambodia?

2. How to improve and enhance teachers' competencies in secondary schools in Prey Veng province, Cambodia?

Purpose of the Study

1. To study the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia.

2. To compare the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia divided by gender and level of degree.

3. To study guidelines for improving and enhancing teachers' competencies in secondary schools in Prey Veng province, Cambodia.

Significance of the Study

The findings of this research would be beneficial to various groups of people including:

1. The results from this research will benefit teachers (especially secondary school teachers) in terms of professional development that allow them to improve knowledge and teaching skills more effectively.

2. Allow school principals to see the current state and problems of teachers' competencies and give support to them as needed in terms of improving teachers' competencies.

3. The results of this study would be beneficial and give MoEYS information about the current states and problems of teachers' competencies and provide training programs for improving their competencies. Last but not least, the research will hopefully serve as a reference for further research in the future.

Scope of the Study

1. **Scope of Content:** It is focused on:

Teachers' competencies in secondary schools comprise of:

1.1 Professional Knowledge

1.2 Professional Practice

1.3 Professional Development

1.4 Professional Ethics

2. **Sample:** The participants in this study:

2.1 The target group of the first part of the study is 248 secondary school teachers who are teaching staff and working in the academic year 2021. They are from 7 selected districts in Prey Veng Province, Cambodia.

2.2 The target group for the second part of this study includes 3 experts from teacher training colleges, teacher training, and development, and school administrators in the field of teacher training and development and administration.

3. **Variables:** The variables of this research consisted of the following:

3.1 Independent Variables:

3.1.1 Gender

1) Male

2) Female

3.1.2 Level of degree

1) Bachelor's degree

2) Higher Bachelor's degree

3.2 Dependent Variables: Teachers' Competencies

      3.2.1 Professional Knowledge

      3.2.2 Professional Practice

      3.2.3 Professional Development

      3.2.4 Professional Ethics

Definition of Terms

Teachers' Competencies, Secondary School, Professional Knowledge, Professional Practice, Professional Development, Professional Ethics

1. Teachers' Competencies refer to the competence of teachers including knowledge, skills, expertise, behavior, and attributes that enable them to perform their job well and effectively. It helps teachers to deal with challenges, the changing education context, and to survive, adapt and thrive in a fast-changing world.

2. Secondary School: refers to a school system that provides education to the students who finished Primary education to continue their education from grades seven to twelve, actually around the ages of twelve to seventeen or eighteen. In Cambodia, secondary school divides into Lower Secondary School (grade 7 to 9) and Upper Secondary School (grade 10 to 12).

3. Professional Knowledge: concerns with the knowledge, understanding, skills, and activities of teachers in the teaching and learning profession such as subject and curriculum content, pedagogical content knowledge, educational trends, policies and context, and personal knowledge

4. Professional Practice: concerns with the competency of teachers in using their professional knowledge and awareness of students, curriculum, planning and implementing lessons, learning assessment, teaching techniques, classroom management strategies, participating in school development, and technology to improve student learning and achievement.

5. Professional Development: encompasses with the teacher regularly reflects on their actual practice, identifying strengths and weaknesses, and continuous improvement and development of their personal and professions through research and education such as training and education in a specialty, participating in professional

learning activities to broaden skills, knowledge, competence, and effectiveness which are critical to improving students' outcomes.

6. Professional Ethics: concerns with teachers' attributes and responsibilities regarding their roles, and duties by demonstrating role models, honesty, neutrality, integrity, and moral behavior both within and beyond the classroom, as well as with students, their parents, and colleagues to ensure that students receive a fair, honest, and conducive education.

Research Hypotheses

1. The respondents of different genders would have different opinions on the state of teachers' competencies.

2. The respondents of different levels of degree would have different opinions on the states of teachers' competencies.
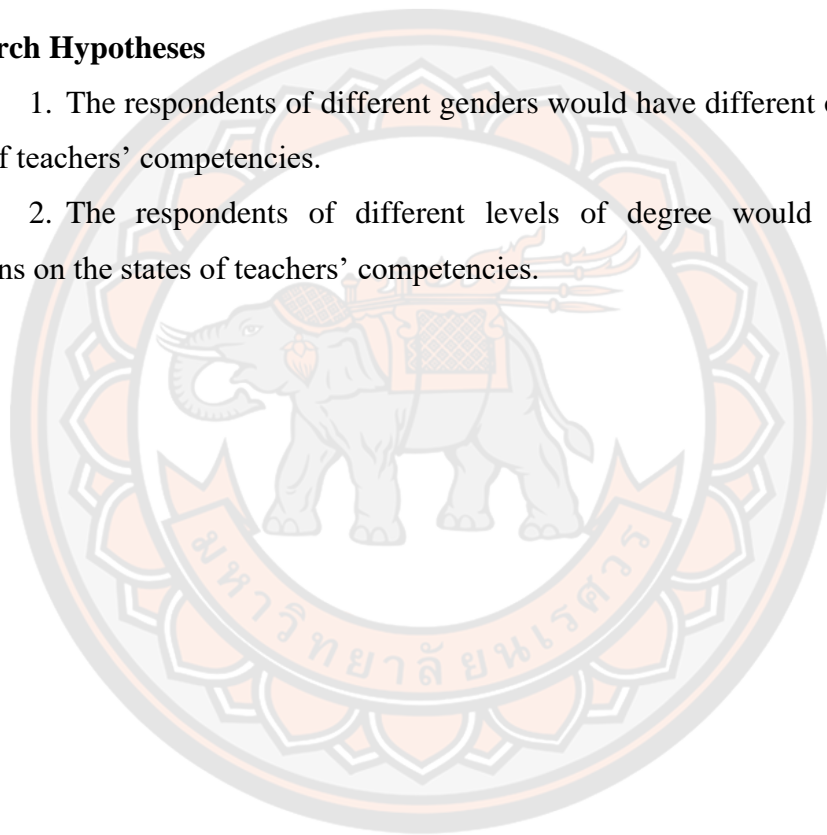
CHAPTER II
LITERATURE REVIEW

According to this study, the researcher uses concepts, theories, and other related research as guidelines to discuss the following topics:

1. General Education System in Cambodia
2. Human Resource Management (HRM)
3. Human Resource Development (HRD)
4. Teacher Training in Cambodia
5. PDCA Model
6. Teacher Professional Standard in Cambodia, Thailand, and Malaysia
7. Lower Secondary School Management
8. Related Research

General Education System in Cambodia

1. Under the French Protectorate and Colonization (1863-1953)

Before the French colonial period, education was conducted at the pagodas, which were the educational and professional training centers of the nation. The Buddhist monks had independent and important educational duties to impart their knowledge with the integration of religious and cultural instructions. For instance, monks would instruct boys and youth in carpentry skills mixed with Khmer literacy closely associated with the concepts of Buddhism and Cambodian culture. During the pre-colonial period, as only pagodas were seen as educational centers for the Cambodian people, the majority of the people were illiterate. There were no other schools. Therefore, the main purpose of education during this period was to educate young men with general knowledge about life and society such as social ethics, life skills, as well as to attain a certain degree of basic literacy (Rany et al., 2012).

The French colonized Cambodia in 1863, but the colonial government did not introduce the modern French schooling systems yet until early 1890. The introduction was mainly provided for the very few Cambodian elite communities who serve the colonial powers. So, pagodas were still an educational center to sustain Khmer's traditional culture. However, this government helped give first-time and

opportunity for girls to have access to formal schooling. The French had done so little too, for the first 20 years of their colony, to interfere with traditional politics and even neglected educational development in Cambodia. In the early twentieth century, the colonial administration started to modernize the traditional schooling system by integrating into the French schooling system to progress in more cooperation and improved agricultural product would serve better their power. Before the 1930s, the French spent almost nothing on education in Cambodia because they thought that it would empower Cambodians to become an obstacle to their grip. Some scholars argued that the French government withheld the quality of education from Cambodians to consolidate and then to maintain power. French schools did deed fail to enrolment numbers of Cambodians until late in the colonial period. The French attempted to transfer their traditional language scripts in the 1940s in Cambodia but were not successful because of the resistance and even actively opposed by Cambodian intellectuals, especially Buddhist monks (Sideth S Dy, 2004).

2. Under Prince Sihanouk (1953-1970)

Cambodia officially granted independence from the French in 1953 by the effort and striving of King Norodom Sihanouk. Cambodia changed its new face, and the new ideology of Buddhist Socialism and the *Sangkum Reastr Niyum* (the People's Socialists Community) of King Sihanouk's regime was introduced. The change of politics from the protectorate to the monarchy also marked the significant changes in education policy during this regime and education became rapidly expanded. Cambodia adopted education as the main development policy to boost economic growth and modernization. Cambodian government used the schooling model developed by the French administration and promised to expand more national budget on the education sector. Many schools rapidly increased with a very high enrolment rate including universities, regional teacher training centers, and vocational schools. Under the management of the Ministry of Education (MoE), public education was divided into primary, secondary, higher, and specialized education. Teachers were paid by the government, and the supplies of materials were greatly contributed. The central national-building perspective of King Sihanouk was to embrace formal education as the policy to transform the country to be an industrial and technologically advanced modern nation. Unfortunately, the politic in Cambodia was

changed by 1970 bringing the gloomy tragedy to Cambodia again after King Sihanouk was overthrown by General Lon Nol and the National Assembly to form a new government known as the Khmer Republic (KR) (Pov & Kawai, 2020).

3. Under the Khmer Republic Regime (1970-1975)

In the early 1970s, the government of King Sihanouk was overthrown by General Lon Nol, backed by the United States, and then the Khmer Republic regime (KR) was created immediately. During this era, the country was unavoidably fell into the Vietnam war. Cambodia was driven by disorder and civil conflict which made the obstacles of schooling opportunities. Due to the national instability and political confusion, the Lon Nol regime started to reduce the educational funding and many schools closed in the rural areas. Concurrently, many teachers fled to join the Khmer Rouge movement while students and teachers demonstrated frequently in Phnom Penh. By early 1972, the United States bombardment aimed at slowing the spread of communism from the East. As a result, the educational system and infrastructure were seriously damaged (Sideth S. Dy, 2004). During the five years of the KR regime, the enrolment rate rapidly declined due to the dramatic rise of dropouts. There were not any new forms of education strategies or policies found of this regime for the expansion of the education sector (Pov, & Kawai, 2020).

4. Under the Khmer Rouge Regime (1975-1979)

In April 1975, Cambodia was plunged into complete darkness during the regime of Democratic Kampuchea or the infamous Khmer Rouge which came into power. This regime made the mass destruction of individual property, schooling system, and social culture by forcing the entire population either into the army camps or onto collective farms. All the educational infrastructure was damaged. And almost three-quarters of the educated population including teachers, students, professionals, and intellectuals were killed under this regime. During the Khmer Rouge regime, all schools were closed. Educated people and teachers were put in prisons and killed. At the beginning of the 1970s, more than 20,000 teachers lived in Cambodia; only about 5,000 of the teachers remained ten years later. According to Soviet sources reported that 90 percent of teachers were killed under the Khmer Rouge regime. There were only 50 of the 725 university instructors, 207 of the 2,300 secondary school teachers, and 2,717 of the 21,311 primary school teachers who survived. An entire generation

of Cambodian children grew up illiterate. When that period ended, the country faced serious problems related to the capacity of the population. The average literacy rate had dropped to less than 20 % and very few people who had been professionally trained to provide basic education were still alive (Bray et al., 2016; Kitamura et al., 2015).

5. **Present Education in Cambodia (1979-Present)**

Since 1979, the government has placed a high priority on education and has tried very hard to ensure some basic education for all. The government of Cambodia has made a clear decision to provide schooling for children as quickly as possible by providing schools to attend and teachers in the classrooms, although many may not be qualified for the job at the present. Now the focus must turn towards upgrading the quality of education. So, the government will be required to make some hard decisions about the quality and financial resources in higher education. To accomplish these, the government has tried to cooperate with other non-government organizations, partners, and donors both regional and global. So, as education is the key to the future, it follows that the government should take full advantage of available educational resources, using them wisely, by building on the experience of its many partners as well as on its own experience in determining the long-term success of the process leading to true peace in Cambodia (Sophoan, n.d).

After the reform in 1996 to the present, the formal education in Cambodia is formulated in 6+3+3 which means a total of 12 years for the completion of general education. It is divided into primary, and secondary education. For primary education, it takes six years (grade 1 to 6), and secondary education consists of three years for lower secondary school (grade 7 to 9) and three years more for upper secondary school (grade 10 to 12). Basic education in Cambodia generally has 9 years of education from grade 1 to 9. Students who are finished grade 9 must be passed the national exam which is conducted by the Ministry of Education and Sport. Only the students who get a grade 9 certificate can continue their studies at the upper secondary school. The students who failed the exam need to study again and try to take the exam for the year. They also can take the vocational training which is prepared Ministry of Labor, Ministry of Education, Youth and Sport, and other development partners, and non-organizations (BOOKBRIDGE, 2012).

The educational system in Cambodia is run by the Cambodian state, and general education is based on a national school curriculum that consists of two main parts: basic education and upper secondary education. The basic education curriculum is divided into three cycles of three years each. The first cycle (grade 1 to 3) which is allocated to the five main subjects are Khmer, Mathematics, Science and Social Studies including Arts, Physical and Health Education, and local life skills programs. The second cycle (grade 4 to 6) is the same as the first cycle. And the third cycle (grade 7 to 9) is allocated for seven major subjects: Khmer, Mathematics, Social Studies and Science, Foreign languages, Physical and Health Education and Sports, and Local life skills program.

The Upper Secondary Education curriculum consists of two different phases. The curriculum for the first phase (grade 10) is identical to the third cycle of primary education. The second phase (grade 11-12) has two main components: Compulsory and Electives. Compulsory involves four major subjects include Khmer literature, Physical and Health Education and Sports, Foreign language (English or French), and Mathematics (Basic or Advance). Electives include three major subjects covering four or five sub-subjects: Science comprises of Physics, Chemistry, Biology, Earth and Environmental Studies; Social Studies comprises of Moral/Civics, History, Geography, Economics; and EVEP (Effective Vocational Education Program): ICT/Technology, Accounting Business Management, Local Vocational Technical Subject, Tourism and Arts Education and other subjects (BOOKBRIDGE, 2012).

After finishing grade12 all students must take the National Examination which is called the grade 12 examination or Bacc II which is conducted by the Ministry of Education, Youth and Sport (MoEYS). After students passed the National Exam and get a grade 12-certificate they can continue their study at higher education both public and private institutions. Students also can take the exam prepared by MoEYS to be a teacher at pre-school, primary, and lower secondary school. After passing the exam, they need to take two years of training courses at the Teacher Training College.

Human Resource Management (HRM)

   1. Definition of HRM

   Wilton (2013) defined Human resource management (HRM or simply HR) as the term commonly used to describe all those organizational activities concerned with recruiting and selecting, designing work for, training and developing, appraising and rewarding, directing, motivating, and controlling workers. HRM also refers to the structure of philosophies, policies, procedures, and practices for the management of the relationship that exists between an employer and employee. He stated that this relationship is critical to an appreciation of how firms can translate HRM practices into improved both individual and organizational performance.

   In the organization, HRM specialists play a central and leading role and responsibility for all HR processes such as fulfilling an advisory capacity for managers in other areas of the business, filling a job vacancy, providing support in designing job specifications and advertisements, ensuring legal compliance and assisting with or advising on the selection process. They might specialize in one or more specific areas, such as reward, training, or diversity. To accomplish the goals not only the responsible of HR specialists but also the responsible of managers in all areas for management of co-workers too.

   Human resource management refers to the practices and policies you need to carry out the personnel aspects of your management job, specifically, acquiring, training, appraising, rewarding, and providing a safe, ethical, and fair environment for your company's employees. These practices and policies are conducting job analysis, planning labor needs and recruiting jobs candidates, selecting job candidates, orienting and training new employees, appraising performance, managing wages and salaries, providing incentives and benefits, communicating (interviewing, counseling, disciplining), training and developing current employees, and building employee commitment. Based on Gary the success of an organization, managers must have the knack for hiring the right people for the right jobs and motivating, appraising, and developing them (Dessler, 2006).

   According to Susan human resource management is the organizational function that manages all of the issues related to the people in an organization. That includes but is not limited to compensation, recruitment, and hiring, performance

management, organization development, safety, wellness, benefits, employee motivation, communication, policy administration, and training. It is also a strategic and comprehensive approach to managing people and the workplace culture and environment. It enables employees to contribute effectively and productively to the overall company direction and the accomplishment of the organization's goals and objectives (Susan, 2020).

Human resource (HR) management is the act of designing management systems to ensure that human talent is used effectively and efficiently to accomplish organizational goals. According to them whether employees are in a big company with 10000 positions or a small non-profit agency with 10 positions, employees must be recruited, selected, trained, and managed effectively. They also must be adequately and competitively compensated, and many will be given a range of benefits. Additionally, appropriate and legal HR systems are needed to comply with numerous legal requirements. In an environment in which the workforce keeps changing, laws and the needs of employers change too. Therefore, HR management activities continue to change and evolve(Lim et al., 2010).

Decenzo, & Robbins (1999) Human resource management is the part of the organization that is concerned with the "people" dimension. According to them, every organization is comprised of people. Acquiring their services, developing their skills, motivating them to high levels of performance, and ensuring that they continue to maintain their commitment to the organization are essential to achieving organizational objectives. This is true regardless of the type of organization-government, business, education, health, recreation, or social action. Getting and keeping good people is critical to the success of every organization. To look at HRM more specifically, we propose that it is an approach consisting of four basic functions: (1) staffing, (2) training and development, (3) motivation, and (4) maintenance. In less academic terms, we might say that HRM is made up of four activities: (1) getting people, (2) preparing them, (3) stimulating them, and (4) keeping them.

2. Process of HRM

Most experts agree that managing involves five functions: planning, organizing, staffing, leading, and controlling. In total, these functions represent the management process. One of these functions-the staffing, personnel management, or human resource management (HRM) function (Dessler, 2011). It provides you with

concepts and techniques you need to perform the "people" or personnel aspects of your management job. These include:

     2.1 Conducting job analyses

     2.2 Planning labor needs and recruiting job candidates

     2.3 Selecting job candidates

     2.4 Orienting and training new employees

     2.5 Managing wages and salaries

     2.6 Providing incentives and benefits

     2.7 Appraising performance

     2.8 Communicating

     2.9 Training and developing managers

     2.10 Building employees commitment

According to (Noe et al., 2011) many companies refer to HRM as involving "people practice" that there are several important HRM practices that should support the organization's business strategy. Thus, an organization performs best when all of these practices are managed well. They are: (human resource planning) analyzing work and designing jobs, determining how many employees with specific knowledge and skills are needed; (Recruiting) attracting potential employees; (selecting) choosing employees;(training and development) teaching employees how to perform their jobs and preparing them for the future;(performance management) evaluating their performance; (compensation) rewarding employees; (employee relations) creating a positive work environment.
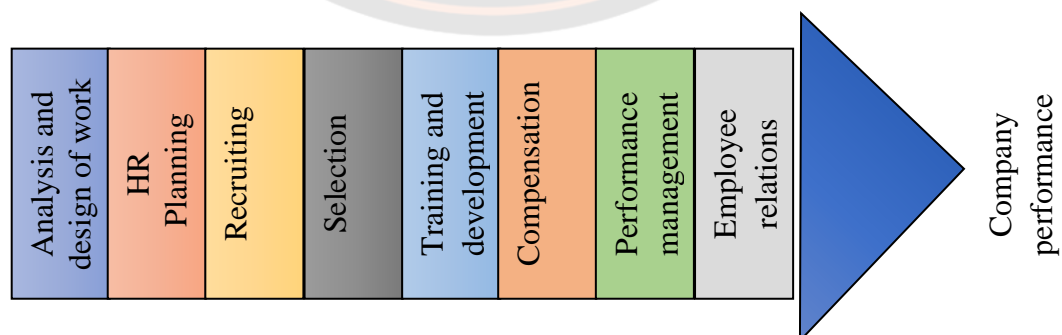
Figure 1 Strategic Management

Source: Noe et al., 2011

Employees are the biggest asset of every organization as their productivity levels are directly proportional to the organization's success. However, the guiding principle in every organization is that 'general interest must prevail over the individual interest of the employee'. This is possible only through proper strategic planning and execution, which is carried out by the human resource (HR) department of the organization. Thus, the HR department plays a key role in ensuring a successful run of an organization. They follow various processes to formulate stellar strategies. The processes are (1) human resource planning (Recruitment, Selecting, Hiring, Training, and various other processes); (2) Remuneration to employees and other benefits; (3) Performance management; and (4) Employee relations. These core processes should go in a step-by-step manner starting from planning human resource management to employee relations. However, Performance Management systems may vary from one organization to another. (HRM) is the most significant and primary process for formulating an appropriate strategy for the organization. This includes putting the right person in the right place according to his skills and achievements. It starts with the recruitment and goes until the proper training of the employee so that he becomes an asset for the company(MITSDE, 2018).

Cascio (2019) stated that people are the root of any organization. Without people, organizations can not exist. In the organization, differences of both physically and psychologically of every employee are the frustration of managers to drive them to reach the initiated goals. The selection of new employees is a critical thing in any organization. So, the human resource (HR) strategy must be well designed before establishing. He proposed five activities for all managers must be concerned about when they come to managing people. They are:

1. Staffing: comprises the activities of (1) identifying work requirements within the organization; (2) determining the number of people and the skills mix necessary to do the work; and (3) recruiting, selecting, and promoting qualified candidates.

2. Retention: comprises the activities of (1) rewarding employees for performing their jobs effectively; (2) ensuring harmonious working relations between employees and managers; and (3) maintaining a safe, healthy work environment.

3. Development: is a function whose objective is to preserve and enhance employees' competence in their jobs through improving their knowledge, skills, abilities, and other characteristics; HR specialists use the term competencies to refer to these items.

4. Adjustment: comprises activities intended to maintain compliance with the organization's HR policies (e.g., through discipline) and business strategies (e.g., cost leadership)

5. Managing Change: is an ongoing process whose objective is to enhance the ability of an organization to anticipate and respond to developments in its external and internal environments, and to enable all employees at all levels to cope with the change.

In conclusion, people are a major component of any business, and the management of people (human resource management, HRM) is a major part of every manager's job. It is also the specialized responsibility of the HR department. We use the term strategic HRM to refer to the wisest possible use of people concerning the strategic focus of the organization. HRM involves five major areas: staffing, retention, development, adjustment, and managing change. Together they compose the HRM system, for they describe a network of interrelated components. The HRM function is responsible for maximizing productivity, quality of work-life, and profits through better management of people.

3. Training and Development

Individual selection was generally used by many organizations across the world to get new employees into the organizations. After getting them, the next thing we need to do is train them to do their new jobs. New employees should get at least basic training about the organization and its routine processes as well as the job that they are going to be filling. Providing training and development generally decreases expensive turnover, and employees are less likely to engage in neglectful behaviors. Through training and development managers can expect that their workers will know how to do the job and succeed in it. So, training and development should be provided immediately.

Lussier, & Hendon (2013) Training and development are come up with two different terms, training and development but both are related. Training is the process of teaching employees the skills necessary to perform a job. It should be primarily and immediately provided to new or beginner employees to provide them with the knowledge, skills, and abilities that they will need to succeed in their work for the organization. Whereas development is continuing education to improve knowledge and skills for present and future jobs. It is designed to teach the workers to become skillful at tasks and to move into higher-level jobs in the organization in the future. Development is aimed at improving human, communication, conceptual, and decision-making skills, in managerial and professional employees. So, training and development are essential for building employees' competency related to knowledge, skills, and abilities needed to perform a particular job in the organization and to adapt them to a competitor in today's dynamic environment.

Snell, & Bohlander (2010) stated that training and development have become part of the backbone of strategic management and play a vital role in nurturing and strengthening the competencies of a firm. It is casually used by organizations to deal with new employees because many of them come equipped with knowledge, skills, and abilities (KSAs) and others require extensive training before they start work in the organization. According to them, training is used to foster learning among its members in an organization that tends to be more narrowly focused and oriented toward short-term performance concerns, and development, which tends to be oriented more toward broadening an individual's skills for future responsibilities. Through, training and development both employees and managers can continuously hone their KSAs to maintain effective performance to get an edge over competitors, equip with rapidly changing technologies, and accomplish organizational goals. So, a single phrase training and development is recognized as the combination of activities organizations use to increase the skill base of employees.

Although organizations base hiring decisions on candidates' existing qualifications, most organizations provide ways for their employees to broaden or deepen their knowledge, skills, and abilities. To do this, organizations provide for employee training and development. Training is a planned effort to enhance employees to learn job-related knowledge, skills, and behavior. For example, many

organizations offer safety training to teach employees safe work habits. Development involves acquiring knowledge, skills, and behaviors that improve employees' abilities to meet the challenges of a variety of new or existing jobs, including the client and customer demands of those jobs. Development programs often focus on preparing employees for management responsibility. Likewise, if a company plans to set up teams to manufacture products, it might offer a development program to help employees learn the ins and outs of effective teamwork (Raymond, A. Noe et al., 2014).

Dessler (2006) Training refers to the methods used to give new or present employees the skills they need to perform their jobs. It plays an increasingly vital role in implementing employers' strategic plans. During the training, the trainer can have a chance to sit down with management and help them to identify strategic goals and objectives and the skills and knowledge needed to achieve them. And then they work together to identify the skills and knowledge of staff if they do not have, the training needs should be discussed. An employer taking a systematic approach to training, appraising, and rewarding employees can make sense of their efforts to contribute to achieving the company's goals. So, training gets employees to acquire technical skills, team-building, decision-making, communication skills, and technological and computer skills. Based on him, training and development programs can be visualized as consisting of five steps. They are:

1. Needs Assessment: determine the current skills of employees and the skills required to perform work well and establish the objectives

2. Instructional Design: In this step, we can design a lesson plan, validate, and implement a training program and include appropriate materials and techniques for training

3. Validation: to revise the lesson plan to make sure that it is well prepared and any to change to ensure program effectiveness.

4. Implementation: implement the curriculum or training program into practice and also involve some employers' roles.

5. Evaluation: this step is data obtained both before and after training to evaluate trainees' reactions, learning, behavior, and result.

According to Rothmann, & Cooper (2015), training and development is the process of ensuring that the workforce of an organization has the knowledge, skills, and engagement it needs. He emphasizes that the organization should commit its resources only to those training activities that can best help in achieving its objectives, such as more efficient production methods, improved quality of products and services, or reduced operating costs. The reasons for training are: (1) to give employees direction in their jobs and acquaint them with their working environment so that they can become productive quickly; (2) to provide human resources that are necessary for commerce and industry to be effective; (3) to increase the loyalty and morale of employees; and (4) to improve the quality and quantity of an organization's output and to reduce costs.

Identification of training needs   **Training and development**   **Evaluation**

Identification of needs
- Organizational analysis
- Task analysis
- Person analysis

Development of criteria

Selection and design of the program

Training objectives

Presentation of the program

Use of evaluation models
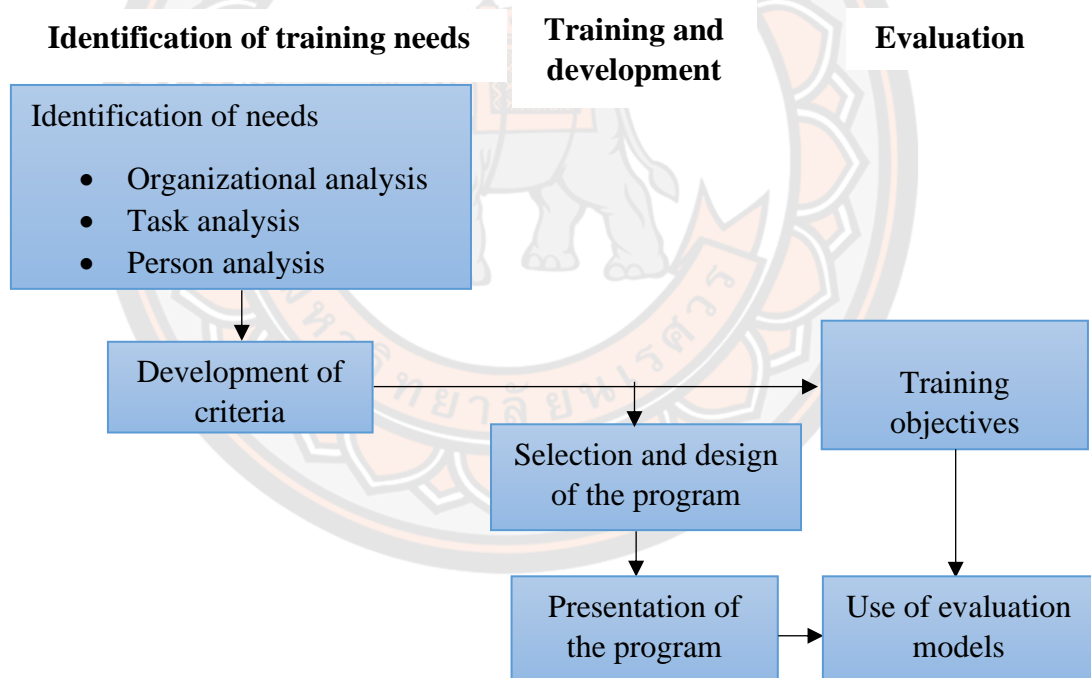
Figure 2 The Training Cycle

Source: Rothmann, & Cooper, 2015

Fei (2018) stated that every organization always faces risks and crises. To deal with this, the involvement of employees and supply chain partners is essential. People or employees are essential and have an important role. They need to possess not only technical skills and competencies that are essential for the management of the risks and crises but also some important soft skills which are critical for the facilitation of such management. In this connection, organizations will need to organize training and education for their employees so that they can be well equipped with tools and techniques to effectively perform their job in risk and crisis management scenarios. This can be done through professional education and training institutions and/or consultants, both internally and externally. Meanwhile, continual drills are also essential to ensure that employees are apt to perform as expected during risk and crises.

Human Resource Development (HRD)

1. Definition of HRD

According to Wilton (2013), human resource development (HRD) encompasses a range of practices and processes to ensure that a firm's human resources are equipped with the skills, knowledge, competence, behaviors, and attitudes required for effective performance both now and in the future. He stated that continuous learning represents a key strategy for coping with uncertainty and the importance of employee and organizational adaptability and responsiveness to an evolving business environment.

Human resource development (HRD) can be defined as a set of systematic and planned activities designed by an organization to provide its members with the opportunities to learn necessary skills to meet current and future job demands. HRD programs must respond to job changes and integrate the long-term plans and strategies of the organization to ensure the efficient and effective use of resources (Werner, & DeSimone, 2006).

Human Resource Development (HRD) is the process of helping people to acquire competencies and skills to ensure their usefulness to the organization in terms of both present and future organizational conditions (Tyari, 2019). It also helps employees to understand their capabilities better so that they can best utilize them and

also fulfill their expectations both professional and personal. Human Resource Development (HRD) is a recent new systematic approach to proactively deal with issues related to individual employees, teams, and the total organization.

Reddy (2007) defined HRD as an organizational learning experience, conducted in a definite time, to increase the possibility of improving job performance and growth. The term HRD is up from 'Human' focuses on the fact that the organizations depend on HR for the production of goods and services, 'Resource' acknowledges that people represent the most valuable resource in organizations, and finally 'Development' recognizes that people have a nearly unlimited capacity to learn, grow, and improve their performance. According to him through development employees can acquire capabilities-competencies include knowledge relevant to the job, an attitude that promotes work, appropriate values, and work ethics as well as skills that are needed to perform the present and the future job well.

According to Sands (2020), human resource development, also known as HRD, is the training and development you give your employees. It is the way your skill up your staff so they can work at their best and give you a competitive edge. It includes training your staff when they first join your SME, sharing helpful tools to help them do their jobs properly, and giving them opportunities to learn new skills (Sands, 2020). She states that the HRD has five benefits as; (1) employees with a set of skills, (2) support your business goals, (3) increase workforce diversity, (4) helping you improve internal mobility and talent retention, and (5) easier employee management. Note: your business may have all the insight, investment, and tech in the world, but without a talented workforce, who will drive your business forward? Human resource development helps you create that talented workforce and is an essential element of a high-performing organization.

2. Process of HRD

Problems occur in the organizations, not because of the employees, but because of the failure of management to foresee the importance of a system in the organization. Some recognized it but did not spend time to establish it or did not implement it correctly. A system can be established correctly only if the organization realizes the activities from receiving materials to delivery to the customer as a set of

processes (Ramasamy, 2009). He suggests that every organization should therefore be a well-knit collection of processes to practice and be competitive and successful.

McGuire (2014) strategic HRD has taken its place as a key mechanism for aligning organizational goals and priorities and ensuring that HRD provision is structured, systematic, and future-oriented. Adopting a strategic approach to the provision of HRD is seen by many organizations as being critical to responding to globalization and rapid changes in the external environment. To perform a strategic role, HRD needs to be recognized by senior management as making a valuable contribution and needs to help the organization face future challenges through environmental scanning and proactive pre-empting of future trends and developments. Thus, HRD professionals are increasingly being tasked with showing how their work adds value to the business and aligns with organizational goals and priorities.

Armstrong (2006) learning and development strategies ensure that the organization has the talented and skilled people it needs and that individuals are allowed to enhance their knowledge skills and levels of competence. Strategic HRD aims to produce a coherent and comprehensive framework for developing people through the creation of a learning culture and the formulation of organizational and individual learning strategies as well as developing the intellectual capital required by the organization as well as ensuring that the right quality of people is available to meet present and future needs. The main thrust of strategic HRD is to provide an environment in which people are encouraged to learn and develop. It is business-led, its specific strategies have to take into account individual aspirations and needs.

Strategic HRD is defined by Walton (1999) as follow: 'Strategic human resource development involves introducing, eliminating, modifying, directing, and guiding processes in such a way that all individuals and teams are equipped with the skills, knowledge, and competencies they require to undertake current and future tasks required by the organization'.

Shah (2020) the process of human resource development is based on which executives, managers, or employees conduct daily activities and maintain a level of enthusiasm among the workforce. A strategy is long-term planning that is developed and implemented by top management. These plans are used to seize opportunities and allocate resources. It includes plans to create new products, acquire

other companies, sell unprofitable aspects of the business, make shares available, and enter international markets. A strategic training process is also used to train executives, managers, and employees. Training prepares personnel for the dynamics of performance that arise in human behavior. It is done through training seminars, events, and programs.

Strategic human resource development has multiple benefits including:

1. Increase extrinsic and intrinsic job satisfaction

2. Boosted customer satisfaction

3. Effective and efficient use of human resources

4. Development of a working environment

5. Making human resource development activities proactive and impactful

6. Equipping human resources to apply theoretical knowledge practically

7. Increasing productivity

Finally, HRD professionals are building strategic partnerships with the HR function and senior management. To be seen as performing a significant role, the HRD function needs support and leadership from senior management as well as sufficient resources to discharge HRD activity efficiently and effectively. Also, the HRD function has realized that it needs to work proactively with the HR function to deliver complementary messages regarding the purpose and direction of the organization, ensuring that employees, through their work activities, understand and remain aligned to the organization's vision (McGuire, 2014).

Assessment	Design	Implementation	Evaluation
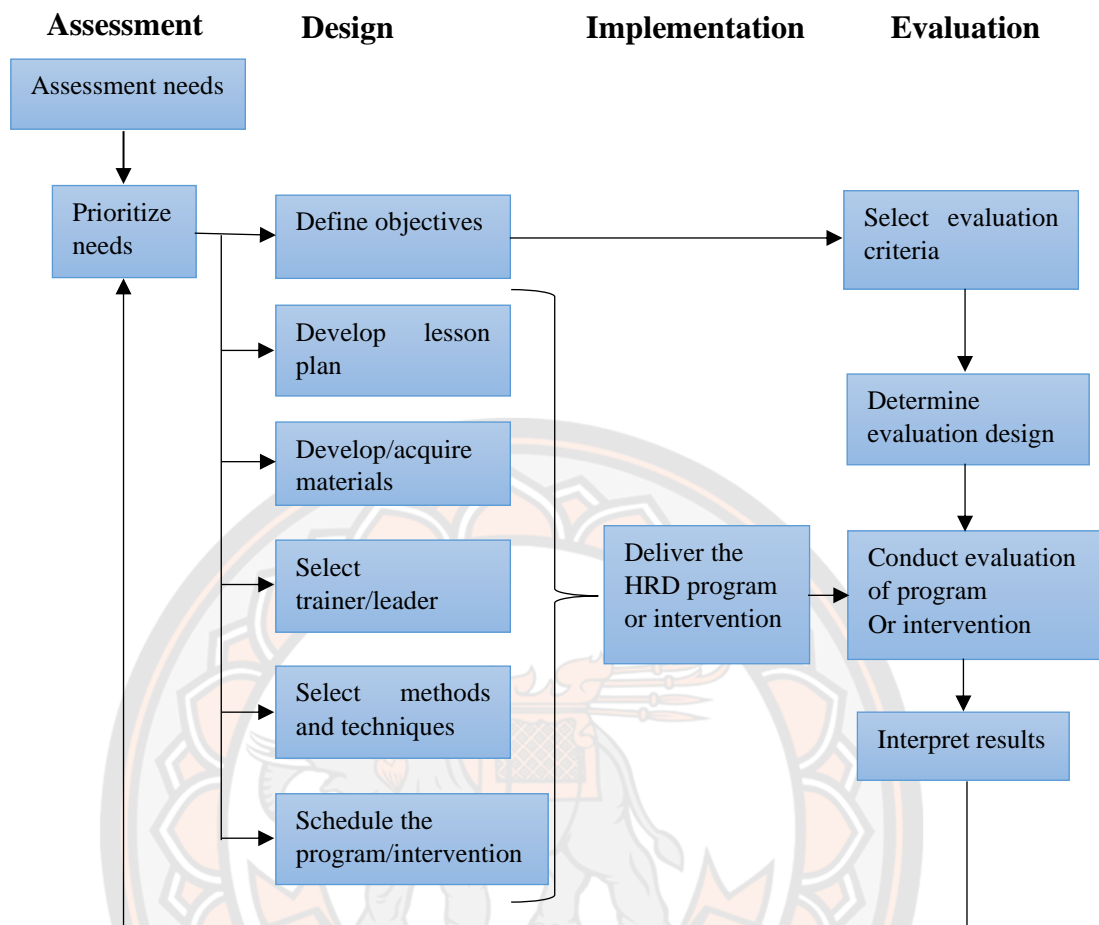
Figure 3 Training and HRD Process Model

Source: McGuire, 2014

3. Assessment Need

Need assessment (or needs analysis) is a process by which an organization's HRD needs are identified and articulated. A needs assessment can be comprised of (i) an organization's goals and its effectiveness in reaching these goals, (ii) gaps between employees' skills and the skills required for effective current job performance, (iii) discrepancies between current skills and the skills needed to perform the job successfully in the future, and (iii) the conditions under which the HRD activity will occur. Through these, HRD professionals can learn what are interventions, who needs to be included, any roadblocks that affect the effectiveness. And then they can establish criteria to guide the evaluation process for an effective

HRD process. Robert Brinkerhoff proposes two ways of looking at training needs are (a) diagnostic needs refer to the factors that lead to effective performance and prevent performance problems, and (b) analytic needs aim to identify new or better ways to perform tasks. And we would add compliance needs are those needs mandated by law involve safety training, food handling, or compliance with healthcare regulations. Because these can affect how the intervention is perceived and conducted (DeSimone, & Werner, 2009).

According to Wilton (2013) assessment needs are concerned with identifying training needs, often by analyzing gaps between current work performance and described standards of work or performance criteria. This often involves training needs assessment or analysis (TNA) that seeks both to identify and formally articulate L&D needs. TNA provides the data according to which an employer can decide on the purpose, specific objectives, form, and scale of the required training intervention and how this intervention, and the resultant change in participant behavior, skills, or knowledge, will be assessed. There are three possible levels at which training needs can be identified: organizational; job or occupational; and individual.

(Raymond, A., Noe et al., 2014) Needs assessment is the process of evaluating the organization, individual employees, and employees' tasks to determine what kinds of training if any, are necessary. As this definition indicates, the needs assessment answers questions in three broad areas:

1. Organization-What is the context in which training will occur?

2. Person-Who needs training?

3. Task-What subjects should the training cover?

They stated that there are three elements of needs assessment include:

1. Organization Analysis: it is the process for determining the appropriateness of training by evaluating the characteristics of the organization including its strategy, resources, and management support.

2. Person Analysis: is a process for determining individuals' needs and readiness for training

3. Task Analysis: is the process of identifying the tasks, knowledge, skills, and behaviors that training should emphasize.

4. Design and Development

Wilton (2013), once training needs have been identified, the next stage is to translate these needs into the specific aims and objectives of a learning intervention. This is likely to be in the form of the performance outcomes to result from the intervention, for example, behavior change, efficiency gains or the specific knowledge or skills to be developed. Setting clear objectives informs the design and content of the learning event or process and assists in providing information by which to evaluate its effectiveness, specifically the extent to which it has resulted in addressing the performance gap or achieved these predefined objectives. The involvement of employees and line managers in the design of the training event is likely to have the dual benefit of ensuring 'buy-in' and more participatory and willing involvement in the training as well as ensuring that it addresses specific and relevant 'real world' training needs.

After the needs assessment has been identified. DeSimone, & Werner (2009) designed an HRD program that should be established by HRD professionals. This phase comprises of:

1. Setting objectives (a description of learners' performances we want them to be. It is also used as the basis of determining effective methods to achieve the specified outcome and guide the learners towards specified goals).

2. Develop a lesson plan (a trainer's guide for the actual delivery of training content. It requires the trainer to determine what is to be covered and spent time for each session).

3. Develop/acquire materials (prepare appropriate materials that can influence the training base on the organizational program).

4. Select trainer/leader (choose who is expert for training competency of learners involve the knowledge and various skills needed to design and implement a training program. He or she must be able to communicate their knowledge, use various instructional techniques, has good interpersonal skills, and have the ability to motivate others to learn).

5. Select training methods (select appropriate methods such as instructor-led training or computer-based training based on the objectives of the program).

6. Schedule the program (limit the specific time for the training program and make sure that both trainers and learners are available and have their attention focused on the learning task at hand).

5. Implementation

After defining assessment needs and designing the curriculum or lesson plan has been identified, the next phase in the HRD program is to deliver the lesson plans into practice. Kumar et al. (2013) stated that the goal of the assessment and design phases is to implement effective HRD programs or interventions. This means that the program or intervention must be delivered or implemented using the most appropriate means or methods (as determined in the design phase). Delivering any HRD program generally presents numerous challenges, such as executing the program as planned, creating an environment that enhances learning, and resolving problems that may arise.

Reed (2017) the implementation stage is used after the need assessment and design and development phases are defined. Need assessment phase prioritizes needs whereas the design and development phase aimed to build out training objectives, delivery methods or techniques, curriculum, training materials, trainers or people skills, time and resource commitments, etc. The implementation stage involves delivering the training that was developed in the previous step to the target audience identified during the planning stage. Activities involved at this stage may include preparing the trainer, preparing the learner, and preparing the selected environment.

6. Evaluation

Werner, & DeSimone (2006) defined HRD evaluation as "the systematic collection of descriptive and judgmental information necessary to make effective training decisions related to the selection, adoption, value, and modification of various instructional activities". According to him, several important points should be included in this phase. First, both descriptive and judgmental information may be collected when conducting the evaluation. Because descriptive information provides a picture of what is happening or has happened, whereas judgmental information communicates some opinion or belief about what has happened. Second, evaluation involves the systematic collection of information according to a predetermined plan to ensure that the information is appropriate and useful. Finally, evaluation is conducted

to help managers, employees, and HRD professionals make informed decisions about particular programs and methods. It is a critical step in the HRD process and only one way can know whether the HRD program has fulfilled its objectives.

Conducting evaluation can help the organization to:

1. Determine whether a program is accomplishing its objectives

2. Identify the strengths and weaknesses of HRD programs, which can lead to changes, as needed

3. Determine the cost-benefit ratio of an HRD program

4. Decide who should participate in future HRD programs

5. Identify which participants benefited the most or less from the program

6. Gathering data to assist in marketing future programs

7. Establish a database to assist management in making decisions.

Wilton (2013), evaluation is the final stage of the systematic model. In most cases, evaluation takes place as a final act to provide feedback to trainers, often with the explicit purpose of improving the learning intervention for its next 'run', to determine whether stated objectives have been achieved and to weigh up overall costs and benefits. In essence, the purpose of the evaluation is to assess the extent to which the training intervention has met the needs of all stakeholders (including the organization, trainees, customers, and budget holders) and their specific objectives, (for example, improvement in job performance or service quality, career and personal development, return on investment and cost-effectiveness). He stated that the evaluation phase should be a reflection-both on the part of the trainees and those providing the training-on future training needs that might have arisen from the prior intervention.

In order to fully assess training effectiveness and to consider the viewpoints of a range of stakeholders, evaluation should take place at a number of levels:

1. Reaction level evaluation: used at the post-completion of training to seek participants' views on the training event and it also provides direct feedback to trainers to improve.

2. Immediate level evaluation: to seek the accomplishment of training objectives relevant to learners' learning such as knowledge, skills, attitudes through testing or interviews.

3. Intermediate level evaluation: seeks to assess the impact of training on job performance and the extent to which a learning gap has been filled. It is typically conducted through the performance management process and interviews or questionnaires with trainees, line managers, and customers or clients to seek the training effect on job performance and employee behavior is improved or not.

4. Finally, ultimate-level evaluation: provides a holistic assessment of the impact of training on the overall individual and departmental or organizational performance. It also can be used to evaluate the overall cost-effectiveness of the training.

Teacher Training in Cambodia

In Cambodia, a total of 12 years of formal education is provided: namely, 6 years for primary education level, 3 years for lower secondary level, and another 3 years for upper secondary level. Teacher training is provided at 26 institutions that are divided into four different types: (a) The Pre-School Teacher Training College: PSTTC trains pre-school teachers, (b) 18 Provincial Teacher Training Colleges: PTTCs train primary school teachers. (c) 6 Regional Teacher Training Centers: RTTCs train lower secondary school teachers, and (d) the National Institute of Education: NIE trains upper secondary school teachers (Phin, 2014).

According to Sothina and Ye (2015) in Cambodia teacher is a popular career, it stands in the number one range in the government educational institutions, compares to other public servants of other fields. They stated that to be an upper secondary school teacher all candidates must be passed the recruitment by conducting an examination. They must be graduated with at least a bachelor's degree in any field. Successful candidates must participate in a pedagogical training program for one year, and then after finishing this training course, they become formal teachers and employ at different school locations throughout the country relying on official division. Their works and duties depend on their school instructions.

After the nightmare regime was defeated in January 1979, the education system was rebuilt and developed gradually with very limited human and material resources. The Ministry of Education as well as the government decided to rebuild the education system by "the first learner teaches late learner" and "the person has more knowledge teaches the person has less knowledge." However, the government has tried its best to develop the quality of teachers and improve the teacher selection method (RECSAM, 2019). At the present, Cambodia has specific criteria for recruiting teachers at different levels such as the following:

1. Pre-School Teachers*:* The candidates applying for pre-school teacher must at least finish 12th grade. After they passed the entrance exam, they study in a Pre-School Teacher Training College (PSTTC) for two years including practicum.

2. Primary-School Teachers: The candidates applying for primary school teacher must finish 12th grade and have to receive training for 2 years in Provincial Teacher Training College (PTTCs) after passing the entrance exam.

3. Lower Secondary School Teachers: to be a lower secondary school teacher, the candidates must hold at least Upper Secondary School Certificate and have to study in Regional Teacher Training Centers (RTTCs) for 2 years including practicum after passing the entrance exam.

4. Upper Secondary School Teachers: There is only one institute that produces upper secondary school teachers, ie. National Institute of Education (NIE). The applicants must hold at least a bachelor's degree to apply for the entrance exam to study in NIE for one year including the practicum.

Table 1 Training Formulation at Teacher Training Colleges (TTCs)

Teacher Training Colleges	Period of Training
PSTTC	12+2
PTTCs	12+2
RTTCs	12+2
NIE	Bachelor+1

Note: "12+12" means 12 years of formal education plus another 2 years of pedagogical training at any TTCs.
Source: Phin, 2014

PDCA Model

Continual improvement is the key to driving an organization to meet needs and objectives. To this, some applied existing standardized approaches whereas others attempt to create a distinctive approach that applies to its organization. Anyway, there are many separated approaches from different scholars or professionals. But one of those is the Deming Cycle which has been seen as an appropriate approach for quality improvement that can be applied to all kinds of organizations. This approach was originally proposed by Walter Shewhart; Shewhart Cycle; later in 1950, its name was changed by the Japanese to Deming cycle who is well known as the father of modern quality control. It useful drives the whole process in the organization run well and meet the demand of customers (Evans, 2011).

PDCA (Plan-Do-Check-Act) is an iterative four-stage approach that has been used for continually improving processes, products, or services, and for resolving problems. The PDCA Cycle gives organizations a simple and effective approach for solving problems based on the scientific method and managing change. It also enables businesses to develop hypotheses about what needs to change, test these hypotheses in a continuous feedback loop, and gain valuable learning and knowledge. It promotes testing improvements on a small scale before updating company-wide procedures and work methods (Skhmot, 2017). The PDCA cycle consists of four components:

1. Plan: It is the first phase of the PDCA cycle in which problems and objectives are identified. This phase comprises of three main steps process includes identifying and analyzing the problem, and developing an experiment to test it. Such activities involved in this step are identifying problems, collecting relevant data, understanding the problem's root cause, developing hypotheses about what the issues may be, and deciding which one to test.

2. Do: It is the second phase where the proposed solutions or changes are tested. During this phase there are such activities include developing and implementing a solution; deciding upon a measure to gauge its effectiveness, testing the potential solution, and measuring the results. The test should be carried out with a small-scale experiment. Then the requisite data is collected to make an evaluation later on.

3. Check: Review the experiment, analyze the results, and identify what have learned. This phase is where the results from the do stage are compared to established objectives in the plan step. It is allowed to see the desired results are achieved or not, any gaps, their causes, and discuss the further improvements. And the learnings from the implementation are also gathered. This phase also studies the result, measure effectiveness, and decide whether the hypothesis is supported or not.

4. Act: Action is taken based on what is learned in the check stage. It is the final phase of the PDCA cycle where the results and data from the "do" and "check" stages are discovered. These results are allowed to see the change worked or not, and gaps. If the change did not work, learnings are used to plan new improvements with a different plan and then start the cycle again. If the plan worked, the learning is incorporated and the process can be standardized and implemented across the business. The results of the PDCA cycle can be documented, informed others about process changes, and made recommendations for the future PDCA cycles.
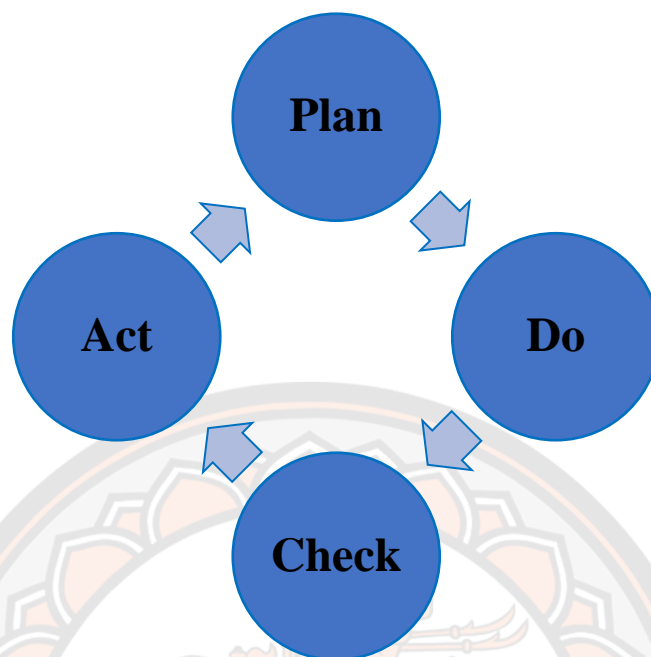
Figure 4 PDCA (Plan-Do-Check-Act) Cycle

Source: Skhmot, 2017

The PDCA cycle has been used to support the process of continuous improvement and provides a framework and structure to identify opportunities for change or improvement and evaluate that change. Applying PDCA in the organization is meant creating an environment of problem-solving and critical thinking. Through this, improvement ideas are tested carefully on a small scale. And then the actual results are analyzed by comparing the required results and resetting the hypothesis. After an effective idea has been found it can be standardized and implemented across the company. The iterative process of the PDCA cycle enables ideas to be continuously tested and promotes a continuous improvement and continuous learning culture (Skhmot, 2017).

Pries, & Quigley (2013) believe that the Shewhart cycle is a potent weapon in the battle against incompetent project closure. The acronym PDCA refers to a plan, do, check, and act. This loop is not executed only one time but continues to execute in perpetuity; until an infinite loop has been found. This sequence has considered as a

common basis in the project management discipline and plays in fostering the project activity by planning, sampling, and controlling until the project closes. It must be understood that the "infinite loop" idea must be continued cycling through the sequence because of the changing of factors and customer expectations. Evans (2011) stated that this cycle is never-ending. It is focused on continuous improvement, so the improved standards can be used to serve for further improvements. It is one of the essential elements of the Deming philosophy which is distinguished from more traditional problem-solving approaches.

Teacher Professional Standard in Cambodia, Thailand, and Malaysia

   Cambodia

    Cambodia's teacher standards were officially approved in 2010 by the Ministry of Education, Youth, and Sport. It was designed to accomplish the following goals in all basic education schools in Cambodia: guide teacher training program reform, help assess teacher training center graduates to ensure they meet minimum standards, focus on teacher technical meetings, and strengthen peer mentoring and instructional supervision by school directors (Tandon & Fukao, 2015b). Cambodia's teacher standards comprise four domains: Professional Knowledge, Professional Practice, Professional Study, and Professional Ethics. Each domain contains several standards specifying observable competencies and behaviors that positively impact student learning. These specifications can be used to assess teacher performance and improve a schools' instructional evaluation and planning.

    1. Professional Knowledge

     1.1 Knowledge of Students

      1.1.1 Know students (their learning needs, capacity, academic backgrounds, and attitude to learning)

      1.1.2 Know clearly about family status and factors. (i.e., gender, social and economic backgrounds, disability and ethnicity) that affect student learning, and how to resolve those factors

     1.2 Knowledge of Content

      1.2.1 Be aware of national educational policies, national education goals, and the purposes of general education.

1.2.2 Understand how to prepare a lesson plan

1.2.3 Understand the curriculum content. Be able to explain and teach subject content well

1.2.4 Understand how to integrate content from one subject to another so students gain transferable skills and are more willing to learn.

1.3 Knowledge of Student Learning

1.3.1 Understand the educational context of classroom and community

1.3.2 Understand how students learn

1.3.3 Understand differences in student skills, learning speed, and learning styles.

2. Professional Practice

2.1 Planning for and Assessment of Learning Outcomes

2.1.1 Prepare correct and effective lesson plans, teaching curriculum, and assessment of learning outcomes.

2.1.2 Prepare teaching and learning materials to achieve student learning outcomes.

2.1.3 Employ a variety of appropriate ways for assessing student learning.

2.1.4 Follow up student participation and maintain records of student progress.

2.1.5 Give feedback to students, parents, or guardians about the development of student knowledge, skills, and attitudes.

2.2 Learning Environment

2.2.1 Provide a safe learning environment and encourage all students to learn.

2.2.2 Help students to become increasingly responsible for their learning.

2.2.3 Participate in school development to support the learning and welfare of students and colleagues.

2.3 Teaching Strategies

2.3.1 Use a range of teaching methods to facilitate student learning and to meet MoEYS curriculum standards.

2.3.2 Meet student learning styles and needs through the suitable implementation of various teaching methods.

2.3.3 Prepare and give students opportunities for learning about problem solutions as well as critical and creative thinking.

2.3.4 Use of information and communications technology. If possible, to make teaching and learning more effective.

3. Professional Study

3.1 Self-Leaning

3.1.1 Regularly evaluate own teaching and plan for personal professional development.

3.1.2 Develop IT knowledge and skills to be applied to teaching and learning.

3.1.3 Improve relationships with students, parents, colleagues, and the community.

3.2 Participation in Improving Teaching

3.2.1 Read professional education articles and carry out research to broaden knowledge and improve teaching.

3.2.2 Interacts with other teachers in professional learning activities.

4. Professional Ethics

4.1 Caring for students and working in the interest of students and society

4.2 Demonstrate commitment and responsibility to the teaching profession

4.3 Demonstrate a positive model of ethical behavior. Enjoy harmonious relationships with students and the community.

4.4 Use fairness and transparency in dealings with students, colleagues, and other members of the community

Thailand

Professor Sermsak Wisalaporn, Chairperson of the Teachers Council of Thailand Board, stated that " Educational Professional Standards" mean provisions relating to desirable characteristics and quality in the practice of the educational profession, to which the Educational Professional Practitioners shall adhere, comprising the standards of Professional Knowledge and Experience, the Standards of Performance, and The Standards of Conduct (Wisalaporn, 2005). The Secretariat Office of the Teachers' Council of Thailand, prepared education professional standards which consist of standards of professional knowledge and experience, standards of performance, and standards of conduct which have been announced as the Teacher Council of Thailand Regulations on Professional Standards and Ethics B.E 2548 (A.D. 2005) (The Teachers' Council of Thailand, 2005). There are 4 main standards required for teachers.

1. Standards of Teacher's Knowledge

A teacher must have minimum qualifications with a Bachelor's degree in education or the equivalent or other degrees as accredited by the Teachers' Council of Thailand, with knowledge in the following areas:

1.1 Knowledge in language and technology

1.2 Knowledge in curriculum development

1.3 Knowledge in learning and classroom management

1.4 Knowledge in psychology

1.5 Knowledge in educational measurement and evaluation

1.6 Knowledge in educational research, innovation and information technology, and teachership.

2. Standards of Teacher's Experience

A teacher is required to have completed teaching functions in educational institutions under an educational degree curriculum for a minimum of one year and passed the criteria for evaluation of the teaching functions in accordance with the rules, procedures, and conditions as set by the teachers' Council of Thailand Board as follows:

2.1 Training on professional practice during the study.

2.2 Teaching functions in educational institutions on specific subjects.

3. Standards of Teacher's Performance

A teacher has to maintain the standards of his/her performance as follows:

3.1 Regularly practice academic activities relating to the development of the teaching profession.

3.2 Make decisions to practice various activities, taking into account their consequences on learners

3.3 Be committed to developing learners to reach their full potential.

3.4 Develop teaching plans for effective implementation.

3.5 Regularly develop effective instructional media.

3.6 Organize instructional activities focusing on permanent results for learners.

3.7 Systematically report on the results of learners' quality development.

3.8 Conduct themselves as good role models for learners.

3.9 Constructively corporate with others in their educational institution.

3.10 Constructively corporate with others in the community.

3.11 Seek and use the information for development.

3.12 Create opportunities for learners to learn under all circumstances.

4. Standards of Conduct or the Professional Code of Ethics

4.1 Personal Ethics

Professional educators must always have self-discipline, self-development in the profession, personality, and vision to keep abreast of educational, economic, social, and political developments.

4.2 Professional Ethics

Professional educators must have love, faith, honesty, and responsibility for the profession and must be an upstanding member of the professional organization.

4.3 Client Ethics

4.3.1 Professional educators must treat students and service end-users equally with love, compassion, concern, help, and support.

4.3.2 Professional educators must promote the creation of learning, skills, and good habits to students and service end-users in tandem with the role and duty to the fullest potential and with sincerity.

4.3.3 Professional educators must behave and be a role model physically, verbally, and psychologically.

4.3.4 Professional educators must not act with antagonism regarding the physical, mental, psychological, emotional, and social growth of students and service end-users.

4.3.5 Professional educators must equally and sincerely give services without requesting or accepting benefits through the abuse of little and position.

4.4 Collegial Ethics

Professional educators shall constructively give help and support one another holding on to the system of morality and unity of the group.

4.5 Societal Ethics

Professional educators shall act as a leader in the conservation and development of the economy, society and religion, art and culture, local wisdom, the environment, public common interests and adhere to the democratic ruling system with the king as the Head.

Malaysia

Standard of Malaysian teacher (Standard Guru Malaysia, SGM) was developed by the Ministry of Education (MoE) in 2005 to provide indicators of the professional competencies among teachers as well as for quality assurance in teacher training. This document serves as a guide and reference for teachers' self-reflection and planning of training courses by teacher trainers in the public or private educational institutions.

There are two components in SGM: Standards and Needs. 'Standard' refers to the statements of professional competencies needed to be achieved by the teacher. 'Need' refers to statements of aspects of teacher training needed to be prepared and implemented by agencies and training institutions related to education and teaching (RECSAM, 2019). There are 3 elements in 'Standard' and five elements in 'Need' as follows:

1. **Standard of Teachers' Professionalism (S1)**

    1.1 Self (e,g sincere, believe in God, endurance, love)

    1.2 Professional (e.g integrity, teamwork, innovation)

    1.3 Social (e.g social skills, love for the environment)

2. Standard of Knowledge and Understanding (S2)

    2.1 Philosophy and aims of education

    2.2 Subject matter

    2.3 Information, Communication and Technology, ICT

    2.4 Setting up a conducive learning environment

    2.5 Assessment

3. Standard of Skills in Teaching and Learning (S3)

    3.1 Planning of lesson

    3.2 Approaches and strategies of teaching and learning

    3.3 Monitoring and evaluation of the effectiveness of teaching

    3.4 Classroom management

4. Professional Needs

    4.1 (K1) Entry qualification and procedure of intake to the teaching training program

    4.2 (K2) Training, assessment, and evaluation

    4.3 (K3) Collaboration

    4.4 (K4) Infrastructure and info structure

    4.5 (K5) Quality assurance

Table 2 Teacher Professional Standard in Cambodia, Thailand, and Malaysia

Cambodia	Thailand	Malaysia	Conclusion
Professional Knowledge	Standards of Teachers' Knowledge	Standard of Knowledge and Understanding	Professional Knowledge
Professional Practice	Standards of Teachers' Experience	Standard of Skills in Teaching and Learning	Professional Practice
Professional Study	Standards of Teacher Performance	Professional Needs	Professional Development

Cambodia	Thailand	Malaysia	Conclusion
Professional Ethics	Standards of Teachers' Conduct	Standard of Teachers' Professionalism	Professional Ethics

Source: adapted from Teacher Professional Standard in Cambodia (Ministry of Education Youth, & Sports, 2019), Thailand (Pilanthananond, n.d; Wisalaporn, 2005), Malaysia (Standard Guru Malaysia, SGM; RECSAM, 2019)

Lower Secondary School Management

The structure of the lower secondary school is divided into school principal, vice-principals both in academic and non-academic, and all teachers in school. The school principal controls the whole work in the school which is supported by the vice-principals both academic and non-academic. Both vice-principals head the works based on their roles and duties. For the head of academics/controls an accountant which responsible for the budget plan, librarian, Head of social and Science studies, and other works such as conducting the exam, scheduling the exam date, timetable setting, etc. The Head of non-academic he is responsible for student discipline, sports, social activities, and other extra activities which support the school operations (Figure 6).
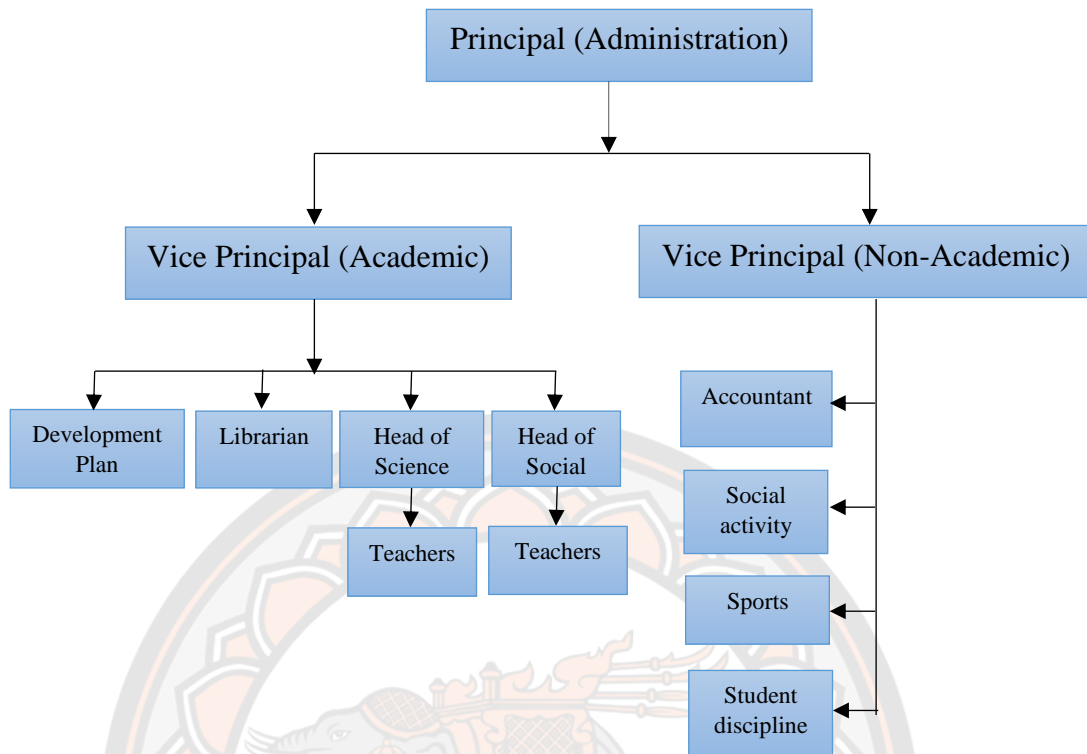
Figure 5 The Structure of Lower Secondary School

Source: The Structure of Smaong Lower Secondary School, 2020

1. School Principal Roles

The principal is responsible for the overall operations of the school. The role of the principal covers many different areas including schedule setting, review of school development plans and procedures, public relations, especially with students' parents and other stakeholders with the support from vice-principals. Sometimes school principal spends his time observing teachers during their teaching in the class to see the strengths and weaknesses of teaching which helps him to advise and give feedback to the teachers to improve the teaching and learning. He also sets a meeting every month to discuss with the vice-principals and teachers to discuss the problems which happened in teaching and learning activities. The meeting aims to find out the facing problems and challenges to find the solutions to solve them. During the meeting school principal also share the knowledge or experiences that he gained from

the workshop or other training programs with the staff in the school to help them to improve both teaching and learning.

2. Vice-Principal Roles

The Vice-principals usually help principal such works in school operation. They also play a vital role in schools and head the work when the principal is absent. They assist the principal by providing support wherever needed. The ultimate responsibility for the running of the school always remains with the principal, and the vice-principal is expected to consult with his principal on all important matters. The vice-principals are usually responsible for setting the school timetable each year, arranging teachers' schedules, assigning classes, setting exam schedules for students, and assigning teachers to proctor the exams. They attend meetings at both the school and district level, help set the agenda for monthly staff meetings, and form committees for teachers. They work closely with student discipline. They speak to students who are sent to the office for inappropriate behavior and determine the consequences. Outside of the school day, they attend student games, plays, and other extra-curricular events, organize field trips for teachers and arrange parent-teacher interviews on a variety of matters. Vice principals keep up with documentation on student discipline and progress. They write letters of recommendation for students and staff.

3. Head of Science and Social studies

Heads of Science and Social studies are responsible for preparing the teachers for their skills in teaching. It means that teachers have to teach the subject that they have learned and trained from the training center. They are responsible for preparing some documents related to the subject of teachers. When teachers have problems with their subjects have to discuss with them for asking some help and guides. they have to provide ideas and solutions to them. Staff needs to report their teachings, problems, and any suggestions to the heads of both sides. Both sides of the Heads also have a meeting to discuss the teaching and learning with their staff to search for problems and deal with them to improve the teaching and learning activities.

4. School Facility

For the school facility, there are three buildings consisting of 14 rooms, a school office, a library, a computer lab, and 11 classrooms. In the school office where principal, vice-principal, staff, and teachers work together. Here there are computers,

printers, copying machines, closets, teaching materials for teachers, sports equipment, etc. In the library, we have bookshelves, books that are written in Khmer and foreign languages. For the computer lab, there are computers, LCD projectors, a white screen, headphones, and other tools which support teaching and learning activities.

Related Research

Ayeni (2020) studied "Teachers' Capacity Building and Productivity in Secondary Schools in Ondo North Senatorial District of Ondo State, Nigeria." The study aimed to investigate the level of teachers' capacity building and determine its implication on teachers' productivity in secondary schools in Ondo North Senatorial District of Ondo State, Nigeria. 30 school principals and 600 teachers were randomly selected from 30 public secondary schools as the sample. Data were collected using two research instruments titled Teachers' Capacity Building Questionnaire (TCBQ) and Teachers' Productivity Questionnaire (TPQ). The studied results revealed that there was a significant relationship between capacity building and teachers' productivity; it was concluded that in spite of the inadequacies in capacity building, teachers maintained a high level of productivity possibly due to their strong commitment to professional duties. However, teachers are still faced with the challenges of excess workloads, large class sizes, and a shortage of instructional materials. It is recommended that the State Government should employ an adequate number of qualified teachers to ensure manageable workloads and improve classroom management; the State Ministry of Education and other relevant stakeholders in the education sector should provide adequate instructional materials and step up efforts in organizing periodic capacity training workloads and seminars based on the professional needs assessment to update teachers' knowledge and skills in instructional best practices to improve productivity in secondary schools.

Igwe, & Ibara (2019) studied "Teachers Capacity Building skills and students Learning Outcomes in Junior Public Secondary Schools in Rivers State." The study aimed to investigate the relationship between capacity building for teachers and students' learning outcomes in Junior Public Secondary Schools in Revers State. The sample for the study consisted of 250 teachers purposively drawn from a population of 2500 Junior Public Secondary School teachers who have attended capacity-

building programs. The researchers used two research instruments were Teachers' Capacity Building Questionnaire (TCBQ) and the Students' Learning Outcomes Questionnaire (SLOQ) to elicit information from the respondents. The study results revealed that: teachers' capacity building on curriculum development has a strong positive relationship with the students' learning outcomes; teachers' capacity building on information and communication technology (ICT), has a strong positive relationship with the students' learning outcomes, and teachers' capacity building in students' assessment has a strong positive relationship with the students' learning outcomes. The study concluded that teachers' capacity building in curriculum development, information and communication technology, and teachers' capacity building on students' assessment will enhance teachers' competencies in teaching which will translate into students' achievement in learning in Junior Public Secondary Schools in Rivers State. The researchers recommended that: there should be capacity building for teachers on curriculum development on annual basis, and teachers' capacity building should always include a module that treats students' assessments and use of information and communication technology (ICT).

King (2018a) studied "Developing teacher capacity in Cambodia: an expanded model." The study was to explore the issue of how best to develop teacher capacity in Cambodia. By using a case study methodology data were collected, primarily, through semi-structured interviews with teachers in three government primary schools located in different geographical areas, and ministry officials and advisors based in these locations. The result indicated that the current cascade model of capacity development, apart from watering down what is taught as it filters along with the system, is not developing the requisite capacity of the teachers. The researcher suggested that the current model limit what constitutes capacity and for whom.

Phin (2014) studied "Teacher competence and teacher quality in Cambodia's educational context linked to in-service teacher training: an examination based on a questionnaire survey." The research aimed to examine Cambodian teachers' perception regarding (1) teacher competence and improving education quality and (2) ensuring teacher quality and in-service teacher training. This study used a questionnaire that targeted a line of educational staff of Cambodia: from school to

central level. In August 2012, 230 copies were distributed, and 173 copies (75.22%) were collected. Through concerning notice, it showed that the majority of higher-ranked officials also have experience working at any school education level. As results, it revealed that (a) respondents realized and indicated explicitly that competent teachers do help contribute to student learning and promote the level of education quality, and (b) respondents recognized the importance of in-service training programs because it helps make teachers more confident in the professional as it can bring people's respects and trust. This paper shortly concludes that Cambodian teachers acknowledge their crucial profession. They further desire to upgrade their capacity through continuous professional development through in-service training programs. Thus, structuring a feasible in-service training model for them becomes needed. The expected structure will be organized following Cambodia's actual situation and the availability of its resources.

Conceptual Framework
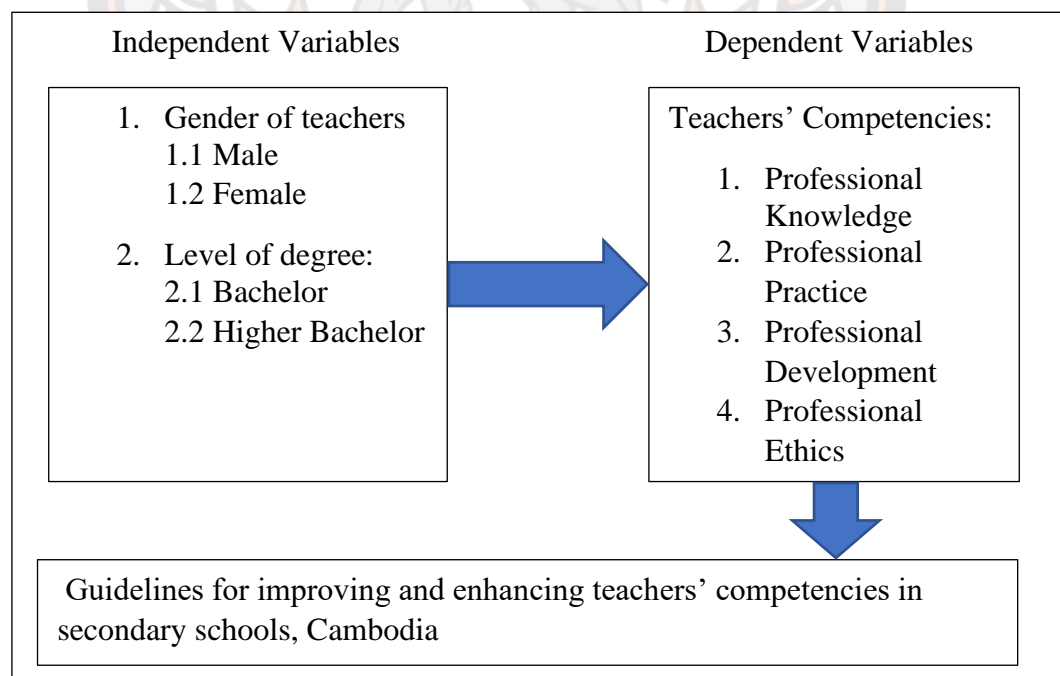
Figure 6 Conceptual Framework

CHAPTER III
RESEARCH METHODOLOGY

This descriptive research focused on the following steps:

1. Population and Sample
2. Research Instrument
3. Data Collection
4. Data Analysis

Step 1: Study the current state and compare teachers' competencies in secondary schools in Prey Veng province, Cambodia

Population and Samples

1. Population

The target population of this study was secondary school teachers in Prey Veng province, Cambodia. There were 13 districts, 124 Secondary Schools, and 2504 teachers in Prey Veng province (MoEYS, 2020). Only 7 districts were selected and there were 61 secondary schools. But only 32 secondary schools were selected by stratified random sampling method with 657 Secondary School teachers.

2. Samples

The sample of this study was secondary school teachers. The sample size was determined through the use of Krejcie and Morgan (1970) table for determining the sample size. According to this formula, the sample size of 248 were teachers in Prey Veng province, Cambodia in the academic year 2021. The multi-stage random sampling method was used for randomizing the sample size for the study and the following processes were followed;

Stage 1: Selection of districts

The first stage, randomizing the districts from the province. There were 13 districts in Prey Veng province but only 7 districts were selected by the Simple Random Sampling method such as Kamchay Mear, Kanhchriech, Pea Reang, Po Rieng, Krong Prey Veng, Sithor Kandal, and Svay Antor were conducted the survey. The districts in Prey Veng province were allocated by 50 percent proportionate.

Stage 2: Selection of schools from districts

In the second stage, Secondary Schools were random from each 7 districts. There were 61 secondary schools in 7 selected districts but only 32 secondary schools were selected by Simple Random Sampling. Schools were allocated by 50 percent proportionate.

Stage 3: Selection of teachers

The final stage was randomizing teachers from 32 secondary schools in 7 districts. There were 248 secondary school teachers.

Research Instruments

1. Characteristics of Research Instruments

The quantitative research instrument that was used in this study was the questionnaire form with structured questions based on literature review and Professional Standards of Teachers in Cambodia, Thailand, and Malaysia. The questionnaire was divided into the following phases:

Part 1: This part focused on the demography of secondary school teachers in Prey Veng Province, Cambodia including gender (male and female) and level of degree (Bachelor's degree and Higher bachelor's degree). A checklist was used as the response format.

Part 2: This part was to study the current state of teachers' competencies in secondary schools in Prey Veng province. A rating scale was used as the response format. The ranking level of four aspects of teachers' competencies was measured into five different levels with different scores as follow:

5 = The highest level

4 = High level

3 = Moderate level

2 = Low level

1 = The lowest level

2. Construction of Research Instruments

Specific steps were followed in the construction of the research instrument as follows:

2.1 The research instrument that was used in this study were questionnaires from the literature review and Professional Teacher Standard in Cambodia, Thailand, and Malaysia

2.2 Conceptual Framework for Research

2.3 Definition of Terms for Construction of Research Instrument

2.4 Construction of Research Instrument for Approval by Advisor

2.5 The content validity was approved through a consultation process with the advisor who reviewed and made recommendations on the research instrument developed by the researcher. After the primary revisions, the research instrument was reviewed for validity by experts:

2.5.1 Dr.Sathiraporn Chaochai, Faculty of Education, Naresuan University, Thailand.

2.5.2 Dr.Thamronglung U-Nakarin, Faculty of Education, Naresuan University, Thailand.

2.5.3 Dr.Kimcheang Hong, Director of Kampong Speu Institute of Technology, Cambodia.

The researcher then made revisions based on the experts' and advisors' recommendations. The measures of questionnaires that had Item Objective Congruence (IOC) of > 0.5 were selected. All measures were identified in 1 value by the experts.

2.6 The research instrument was tried out for reliability with 30 secondary school teachers whose characteristics were similar to the population in this study. The Cronbach's alpha was used in the reliability testing process, the result found that the Alpha Coefficient was 0.96.

Data Collection

The researcher distributed 248 questionnaires to secondary school teachers in 7 selected districts in Prey Veng Province, Cambodia in the academic year 2021 to collect data. Therefore, Kamchay Mear, Kanhchriech, Pea Reang, Po Rieng, Krong Prey Veng, Sithor Kandal, and Svay Antor were the places chosen for collecting data. The data was collected by distributing the questionnaires through telegram and email because schools were closed and teachers working from home due to the Covid-19

pandemic. The researcher received 248 (100%) of the questionnaires. Then it was compiled to analyze.

Data Analysis

After data collection, the following procedure of data analysis was operated:

1. The demography of Secondary School teachers was analyzed using frequency and percentage.

2. The current state of teachers' competencies comprised of four aspects in secondary schools in Prey Veng province, Cambodia was analyzed using arithmetic means ($\overline{X}$) and standard deviation (S.D).

With reference to the 5-point Rating scale, it was divided into 5 equal ranges (Best & Kahn, 1997).

4.50-5.00 is considered the highest level

3.50-4.49 is considered high level

2.50-3.49 is considered a moderate level

1.50-2.49 is considered low level

1.00-1.49 is considered the lowest level

3. To compare the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia, t-test independent was used.

Step 2: Study the Guidelines for improving and enhancing teachers' competencies in secondary schools in Prey Veng province, Cambodia.

This descriptive research focused on the following steps:

1. Target Group

2. Research Instrument

3. Data Collection

4. Data Analysis

1. Target Group

The target group for the second part of the research included experts from teacher training colleges, teacher training and development, and school administrator levels who had the experience of 10 or more years in the field of teacher training and development, and administration in Cambodia. The experts were selected using purposive sampling.

Table 3 Details of Experts selected from the field of Administration

Sl. No	Name	Designation	Experience in Administration
1.	Mr.Sothin Ly	Deputy director of Regional Teacher Training Center (RTTC), Prey Veng	13 years
2.	Dr.Kimcheang Hong	Director of Kampong Speu Institute of Technology, Kampong Speu	10 years
3.	Dr.Soth Sok	Dean at Faculty of Education, Royal University of Phnom Penh, Phnom Penh	20 years

2. Research Instrument

2.1 Characteristics of Research Instrument

The research instrument used in this part of the study was a structured interview from the literature review and Professional Standards of Teachers in Cambodia, Thailand, and Malaysia. The qualitative data was collected from the experts using a phone call and voice was recorded. Semi-structured questions were asked which allowed the experts to share their opinions and expertise of teachers' competencies comprising of Professional Knowledge, Professional Practice, Professional Development, and Professional Ethics in secondary schools in Prey Veng province, Cambodia. The interview was conducted in the following manner:

This part focused on the teachers' competencies in secondary schools in Prey Veng Province, Cambodia with the information provided by the experts of different position levels. Semi-structured or open-ended questions were asked to get the information. The researcher took notes during the interview as well as recorded the conversation.

2.2 Construction of Researcher Instrument

Specific steps were followed in the construction of the research instrument as follows:

2.2.1 The research instrument that was used in this study was the questionnaire from the literature review and the Professional Standards of Teachers in Cambodia, Thailand, and Malaysia.

2.2.2 Conceptual Framework for Research

2.2.3 Definitions of Terms for Construction of Research Instrument

2.2.4 Construction of Research Instrument for Approval by Advisor

2.2.5 The content validity was approved through a consultation process with the advisor who reviewed and made recommendations on the research instrument developed by the researcher. After the primary revisions, the research instrument was reviewed for validity by experts:

1) Dr.Sathiraporn Chaochai, Faculty of Education, Naresuan University, Thailand

2) Dr.Thamronglung U-Nakarin, Faculty of Education, Naresuan University, Thailand

3) Dr.Kimcheang Hong, Kampong Speu Institute of Technology, Cambodia

The researcher then made revisions based on the experts' and advisors' recommendations. The measures of questionnaires that had Item Objective Congruence (IOC) of > 0.5 were selected. All measures were identified in 1 value by the experts

3. Data Collection

The researcher collected data by interviewing three experts of teachers' competencies comprised of Professional Knowledge, Professional Practice, Professional Development, and Professional Ethics in schools in Prey Veng province, Cambodia: one from Regional Teacher Training Center (RTTC), one from the school administrative level, and one from teacher training and development level. Structured interviews using semi-structured or open-ended questions were asked experts to share their opinions and suggestions on improving and enhancing teachers' competencies. The one-to-one interview was conducted and documented. The qualitative data was collected by interviewing experts in the field of teacher training and development through online meetings because of the Covid-19 pandemic and the information was recorded by digital recorder.

The researcher followed the following steps to collect the data:

3.1 The researcher identified and asked for permission to conduct the interview from three experts from teacher training college, teacher training and development, and school administration on teachers' competencies.

3.2 The researcher prepared interview questions that would subsequently help in addressing the guidelines to improve and enhance teachers' competencies in secondary schools in Prey Veng province, Cambodia.

3.3 The researcher planned and prepared for the interview ahead of time considering note-taking using interview guide format and provision of tape recording during the interview.

3.4 The researcher apprised the experts before the interview by contacting them for the appropriate date for interviewing as per their convenience.

3.5 Once the experts were confirmed and the tools were ready, a place and date were set up to conduct the interview for each of the expertise.

3.6 Structured interviews using semi-structured comprising of four aspects of teachers' competencies were prepared to ask and let the experts share their opinions and suggestions to improve and enhance teachers' competencies. The one-to-one interview was conducted and documented.

3.7 Finally, the qualitative data were collected by noting down the key information in the interview guide format during the interview and by using a digital voice recorder.

The researcher conducted the interview for 3 (100%) of the interviewees.

4. Data Analysis

After data collection, the data analysis was analyzed using content analysis. It was done with the results gathered from the interview session and was presented in descriptive form.

CHAPTER IV
RESULTS

Part 1 Demographic Information of Secondary School teachers

Gender

The frequency and percentage of the demographic information of Secondary School teachers by gender are shown in Table 5.

Table 4 Frequency and Percentage results of the Demographic information of Secondary School teachers by Gender

Gender	Frequency	Percentage (%)
Male	152	61.3
Female	96	38.7
Total	**248**	**100.0**

The data in Table 4 shows that the majority (61.3%) of the respondents were male and (38.7%) were female.

Level of degree

The frequency and percentage of the demographic information of Secondary School teachers by level of degree are shown in Table 6.

Table 5 Frequency and Percentage Results of the Demographic Information of Secondary School Teachers by Level of degree

Level of Degree	Frequency	Percentage (%)
Bachelor's degree	225	90.7
Higher bachelor's degree	23	9.3
Total	**248**	**100.0**

Table 5 shows that 90.7% of the respondents were Bachelor's degree while 9.3% were a higher bachelor's degree.

Part 2 The current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia

Table 6 The current state of Teachers' Competencies consists of Professional Knowledge, Professional Practice, Professional Development, and Professional Ethics

Teachers' Competencies	n= 248		Level of Competency
	$\overline{X}$	S.D.	
Professional Knowledge	3.45	0.55	Moderate level
Professional Practice	3.68	0.52	High level
Professional Development	3.82	0.56	High level
Professional Ethics	4.18	0.57	High level
Total T of T	**3.73**	**0.48**	**High level**

Table 6 indicates the respondents' overall level the level of current states of teachers' competencies ($\overline{X}$ = 3.73) was at the high level.

When considered in aspect, it was found that the highest mean was 'Professional Ethics ($\overline{X}$ = 4.18), and the lowest mean was 'Professional Knowledge ($\overline{X}$ = 3.45)'.

The respondents' level of the current state of teachers' competencies on Professional Practice, Professional Development, and Professional Ethics was indicated as high level while for Professional Knowledge was shown at a moderate level.

Table 7 The level of the current state of teachers' competencies in Professional
Knowledge

Item. No	Measures of professional knowledge dimension of teachers' competencies	n= 248		Level of Competency
		$\bar{X}$	S.D.	
1	I know clearly about students' family status involving social and economic backgrounds, disability, and ethnicity.	3.05	0.90	Moderate
2	I know the factors and problems that affect students' learning and deal with them effectively.	3.35	0.74	Moderate
3	I understand well about students' learning needs, capacity, interests, issues, and concerns.	3.54	0.77	High
4	I understand well about students' learning styles and attitudes and how they learn.	3.67	0.75	High
5	I know the educational philosophy, policies, and national education goals.	3.30	0.84	Moderate
6	I am aware of educational assessment, measurement, and evaluation.	3.23	0.80	Moderate
7	I am aware of educational research, innovation and creation, and information technology.	3.20	0.79	Moderate
8	I have knowledge of curriculum content, curriculum development and am able to explain and teach it well.	3.48	0.75	Moderate
9	I understand well about the subject matter and am able to explain and teach it well.	3.95	0.72	High
10	I understand well to prepare the lesson plan and implement it effectively.	3.88	0.72	High
11	I have knowledge of connecting content from one subject to another well.	3.50	0.75	High
12	I have knowledge of foreign languages and technology.	3.03	0.96	Moderate
13	I have knowledge of psychology and communication skills.	3.17	0.84	Moderate
14	I can set up and make facilitative activities in the context of learning.	3.49	0.70	Moderate

Item. No	Measures of professional knowledge dimension of teachers' competencies	n= 248		Level of Competency
		$\bar{X}$	S.D.	
15	I have knowledge in managing classroom and learning activities.	3.85	0.67	High
	Total	**3.45**	**0.55**	**Moderate**

Table 7 indicates that the respondents' overall level of the current state of teachers' competencies of Professional Knowledge was at a moderate level ($\bar{X}$ = 3.45).

When examined in aspect, it was found that the highest mean was about 'I understand well about the subject matter and be able to explain and teach it well ($\bar{X}$ = 3.95)., and the lowest mean was I have knowledge of foreign languages and technology ($\bar{X}$ = 3.03).

Table 8 The level of the current state of teachers' competencies in Professional Practice

Item. No	Measures of professional practice dimension of teachers' competencies	n= 248		Level of Competency
		$\bar{X}$	S.D.	
1	I prepare a correct and effective teaching curriculum to achieve student learning outcomes.	3.69	0.68	High
2	I prepare correct and effective lesson plans and use appropriate learning materials to achieve student learning outcomes.	3.59	0.70	High
3	I use both formative and summative assessment tools to assess students learning and learning outcomes.	3.52	0.79	High
4	I provide feedback to students, parents, or guardians about the progress of students' knowledge, skills, and attitudes.	3.30	0.80	Moderate
5	I maintain a record of students' participation, their progress, and quality development.	3.36	0.80	Moderate

Item. No	Measures of professional practice dimension of teachers' competencies	n= 248		Level of Competency
		$\bar{X}$	S.D.	
6	I create a safe learning environment, encourage and help students to increase their responsibilities in learning.	3.71	0.73	High
7	I participate in school development projects to support the learning and welfare of students and colleagues.	3.84	0.76	High
8	I provide opportunities and encourage students to share their innate talents.	4.03	0.70	High
9	I provide students opportunities to learn and overcome challenges as well as critical and creative thinking.	3.80	0.69	High
10	I apply innovative teaching methods and approach to facilitate students' learning and to meet national curriculum standards.	3.58	0.70	High
11	I use the information and communications technology to make teaching and learning more effective.	3.64	0.77	High
12	I build trusting relationships with students to make them involved in teaching and learning.	3.81	0.70	High
13	I set the classroom rules for students to follow which encourage them to participate in teaching and learning activities.	3.93	0.74	High
	Total	**3.68**	**0.52**	**High**

Table 8 indicates that the respondents' overall level of the current state of teachers' competencies of Professional Practice was at a high level ($\bar{X}$ = 3.68).

When examined in aspect, it was found that the highest mean was about 'I provide opportunities and encourage students to share their innate talents ($\bar{X}$ = 4.03), and the lowest mean was about I provide feedback to students, parents, or guardians about the progress of students' knowledge, skills, and attitudes ($\bar{X}$ = 3.30).

Table 9 The level of the current state of teachers' competencies in Professional
Development

Item. No	Measures of the professional development dimension of teachers' competencies	n= 248		Level of Competency
		$\bar{X}$	S.D.	
1	I regularly evaluate my teaching and plan for personal professional development.	3.66	0.75	High
2	I study to develop IT knowledge and skills, and instructional media that can be applied to enhance the teaching and learning process.	3.70	0.82	High
3	I seek and read educational articles and research for personal and professional development.	3.73	0.75	High
4	I read research studies and articles about specialized instructional techniques to improve the teaching profession.	3.67	0.72	High
5	I conduct action research to broaden knowledge and improve teaching and learning.	3.82	0.71	High
6	I uphold positive relationships with students, parents, colleagues, and stakeholders in the community.	4.00	0.79	High
7	I regularly interact with other teachers in practicing academic and professional learning activities for the development of the teaching profession.	3.98	0.72	High
8	I regularly collaborate with other teachers to share best practices to improve teaching and learning and drive student achievement.	3.96	0.74	High
9	I regularly participate with other teachers and educators to exchange skills and knowledge to improve teaching and learning activities.	3.82	0.70	High
10	I regularly discuss with administrators and other teachers about student-learning results to identify strategies to help their learning.	3.82	0.74	High
	Total	**3.82**	**0.56**	**High**

Table 9 indicates that the respondents' overall level of the current state of teachers' competencies of Professional Development was at a high level ($\bar{X}$ = 3.82).

When examined in aspect, it was found that the highest mean was about 'I uphold positive relationship with students, parents, colleagues, and stakeholders in the community ($\bar{X}$ = 4.00), and the lowest mean was about I regularly evaluate my teaching and plan for personal professional development ($\bar{X}$ = 3.66).

Table 10 The level of the current state of teachers' competencies in Professional Ethics

Item. No	Measures of professional ethics dimension of teachers' competencies	n= 248		Level of Competency
		$\bar{X}$	S.D.	
1	I am personally and professionally self-disciplined to enhance the vision of educational, economic, social, and political developments.	3.89	0.77	High
2	I enjoy harmonious relationships with students and the community.	4.21	0.70	High
3	I have commitment, love, faith, honesty, and responsibility to the teaching profession and organizations.	4.40	0.70	High
4	I solve the problems of students, colleagues, and other members of the community with fairness and transparency.	4.13	0.73	High
5	I care for students and treat them with love, compassion, concern, help, and support.	4.27	0.69	High
6	I demonstrate as a positive role model for my students physically, verbally, and psychologically.	4.23	0.71	High
7	I provide teaching and services equally and sincerely without requesting or accepting the benefits through the abuse of little and position.	4.27	0.73	High
8	I apply my leadership skills in other fields that involve economic, societal, and religious, art and cultural, environmental development, etc.	3.89	0.72	High

Item. No	Measures of professional ethics dimension of teachers' competencies	$\bar{X}$	S.D.	Level of Competency
		n= 248		
9	I am committed to my role and duty to promote the creation of learning, skills, and good habits to all students without discrimination in any dimension.	4.35	0.69	High
	Total	**4.18**	**0.57**	**High**

Table 10 indicates that the respondents' overall level of the current state of teachers' competencies of Professional Ethics was at a high level ($\bar{X}$ = 4.18).

When examined in aspect, it was found that the highest mean was about 'I have commitment, love, faith, honesty, and responsibility to the teaching profession and organizations ($\bar{X}$ = 4.40), and the lowest mean was about 'I am personally and professionally self-disciplined to enhance the vision of educational, economic, social, and political developments' and 'I apply my leadership skills in other fields that involve economic, societal and religious, art and cultural, and environmental development, etc.' ($\bar{X}$ = 3.89).

Part 3 Comparison of the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia as classified by Gender and Level of Degree of teachers

Comparison of the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia as classified by Gender of teachers

Table 11 Comparison of the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia as classified by Gender of teachers

Teachers' Competencies	Male (n=152)		Female (n= 96)		t	Sig.
	$\bar{X}$	S.D.	$\bar{X}$	S.D.		
Professional Knowledge	3.52	0.51	3.33	0.58	2.72	0.38
Professional Practice	3.71	0.51	3.62	0.53	1.40	0.98
Professional Development	3.86	0.54	3.75	0.58	1.42	0.27
Professional Ethics	4.18	0.58	4.19	0.57	-0.12	0.79
Total	**3.77**	**0.46**	**3.66**	**0.50**	**1.73**	**0.60**

Table 11 shows that the overall differences in gender of secondary school teachers had no significant difference at the level 0.05, (p=0.00 <0.05) on the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia

Table 12 Comparison of the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia as classified by Gender of teachers in Professional Knowledge

Item. No	Professional knowledge dimension of teachers' competencies	Male (n= 152)		Female (n= 96)		t	sig.
		$\bar{X}$	S.D.	$\bar{X}$	S.D.		
1	I know clearly about students' family status involving social and economic backgrounds, disability, and ethnicity.	3.10	0.91	2.97	0.89	1.10	0.63
2	I know the factors and problems that affect students' learning and deal with them effectively.	3.41	0.70	3.25	0.78	1.72	0.83
3	I understand well about students' learning needs, capacity, interests, issues, and concerns.	3.63	0.75	3.39	0.79	2.47	0.55
4	I understand well about students' learning styles and attitudes and how they learn.	3.75	0.69	3.53	0.82	2.17	0.02*
5	I know the educational philosophy, policies, and national education goals.	3.41	0.79	3.12	0.89	2.76	0.48
6	I am aware of educational assessment, measurement, and evaluation.	3.32	0.79	3.09	0.80	2.21	0.22
7	I am aware of educational research, innovation and creation, and information technology.	3.30	0.74	3.04	0.83	2.50	0.20

Item. No	Professional knowledge dimension of teachers' competencies	Male (n= 152)		Female (n= 96)		t	sig.
		$\bar{X}$	S.D.	$\bar{X}$	S.D.		
8	I have knowledge of curriculum content, curriculum development and am able to explain and teach it well.	3.53	0.74	3.41	0.78	1.29	0.45
9	I understand well about the subject matter and am able to explain and teach it well	3.99	0.74	3.89	0.68	1.15	0.96
10	I understand well to prepare the lesson plan and implement it effectively.	3.90	0.68	3.85	0.77	0.43	0.27
11	I have knowledge of connecting content from one subject to another well.	3.56	0.74	3.42	0.76	1.46	0.89
12	I have knowledge of foreign languages and technology.	3.15	0.94	2.85	0.96	2.34	0.67
13	I have knowledge of psychology and communication skills.	3.24	0.84	3.06	0.83	1.60	0.39
14	I can set up and make facilitative activities in the context of learning.	3.57	0.68	3.35	0.73	2.41	0.62
15	I have knowledge in managing classroom and learning activities.	3.93	0.67	3.71	0.66	2.60	0.11
	Total	**3.52**	**0.51**	**3.33**	**0.58**	**2.72**	**0.38**

Note: * Level of significance at p<.05

Table 12 shows that the differences in gender of secondary school teachers had no significant difference at the level 0.05, (p=0.00<0.05) on Professional Knowledge of the current state of teachers' competencies. However, there was a significant difference at 0.05, (p=0.00<0.05) for the fourth item (I understand well about students' learning styles and attitudes and how they learn.)

Table 13 Comparison of the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia as classified by Gender of teachers in Professional Practice

Item. No	Professional practice dimension of teachers' competencies	Male (n= 152)		Female (n= 96)		t	sig.
		$\bar{X}$	S.D.	$\bar{X}$	S.D.		
1	I prepare a correct and effective teaching curriculum to achieve student learning outcomes.	3.78	0.70	3.53	0.61	2.89	0.93
2	I prepare correct and effective lesson plans and use appropriate learning materials to achieve student learning outcomes.	3.61	0.72	3.56	0.68	0.47	0.40
3	I use both formative and summative assessment tools to assess students learning and learning outcomes.	3.59	0.82	3.42	0.74	1.65	0.24
4	I provide feedback to students, parents, or guardians about the progress of students' knowledge, skills, and attitudes.	3.33	0.78	3.26	0.84	0.66	0.70
5	I maintain a record of students' participation, their progress, and quality development.	3.41	0.84	3.28	0.72	1.33	0.02*
6	I create a safe learning environment, encourage and help students to increase their responsibilities in learning.	3.75	0.72	3.64	0.74	1.21	0.55
7	I participate in school development projects to support the learning and welfare of students and colleagues.	3.85	0.80	3.82	0.68	0.26	0.06
8	I provide opportunities and encourage students to share their innate talents.	4.05	0.69	3.99	0.72	0.69	0.63

Item. No	Professional practice dimension of teachers' competencies	Male (n= 152)		Female (n= 96)		t	sig.
		$\overline{X}$	S.D.	$\overline{X}$	S.D.		
9	I provide students opportunities to learn and overcome challenges as well as critical and creative thinking.	3.82	0.67	3.79	0.74	0.27	0.26
10	I apply innovative teaching methods and approach to facilitate students' learning and to meet national curriculum standards.	3.61	0.71	3.54	0.69	0.69	1.00
11	I use the information and communications technology to make teaching and learning more effective.	3.63	0.74	3.65	0.82	-0.14	0.48
12	I build trusting relationships with students to make them involved in teaching and learning.	3.87	0.68	3.72	0.74	1.64	0.08
13	I set the classroom rules for students to follow which encourage them to participate in teaching and learning activities.	3.99	0.71	3.84	0.77	1.50	0.09
	Total	**3.71**	**0.51**	**3.62**	**0.53**	**1.40**	**0.98**

Note: * Level of significance at p<.05

Table 13 shows that the differences in gender of secondary school teachers had no significant difference at the level 0.05, (p=0.00<0.05) on Professional Practice of the current state of teachers' competencies. However, there was a significant difference at 0.05, (p=0.00<0.05) for the fifth item (I maintain a record of students' participation, their progress, and the quality development.).

Table 14 Comparison of the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia as classified by Gender of teachers in Professional Development

Item. No	Professional development dimension of teachers' competencies	Male (n= 152)		Female (n= 96)		t	sig.
		$\bar{X}$	S.D.	$\bar{X}$	S.D.		
1	I regularly evaluate my teaching and plan for personal professional development.	3.72	0.75	3.55	0.74	1.77	0.89
2	I study to develop IT knowledge and skills, and instructional media that can be applied to enhance the teaching and learning process.	3.80	0.82	3.55	0.81	2.30	0.42
3	I seek and read educational articles and research for personal and professional development.	3.74	0.72	3.70	0.80	0.46	0.29
4	I read research studies and articles about specialized instructional techniques to improve the teaching profession.	3.66	0.71	3.68	0.73	-0.14	0.88
5	I conduct action research to broaden knowledge and improve teaching and learning.	3.88	0.66	3.73	0.77	1.53	0.01*
6	I uphold positive relationships with students, parents, colleagues, and stakeholders in the community.	4.01	0.78	3.99	0.81	0.17	0.74
7	I regularly interact with other teachers in practicing academic and professional learning activities for the development of the teaching profession.	4.05	0.67	3.89	0.78	1.66	0.02*

Item. No	Professional development dimension of teachers' competencies	Male (n= 152)		Female (n= 96)		t	sig.
		$\bar{X}$	S.D.	$\bar{X}$	S.D.		
8	I regularly collaborate with other teachers to share best practices to improve teaching and learning and drive student achievement.	3.99	0.75	3.92	0.72	0.73	0.81
9	I regularly participate with other teachers and educators to exchange skills and knowledge to improve teaching and learning activities.	3.86	0.68	3.76	0.74	1.02	0.03*
10	I regularly discuss with administrators and other teachers about student-learning results to identify strategies to help their learning.	3.86	0.74	3.76	0.75	0.98	0.55
	Total	**3.86**	**0.54**	**3.75**	**0.58**	**1.42**	**0.27**

Note: * Level of significance at p<.05

Table 14 shows that the differences in gender of secondary school teachers had no significant difference at the level 0.05, (p=0.00<0.05) on Professional Development of the current state of teachers' competencies. However, there was a significant difference shown at 0.05, (p=0.00<0.05) for the fifth item (I conduct action research to broaden knowledge and improve on teaching and learning.), seventh item (I regularly interact with other teachers in practicing academic and professional learning activities for the development of teaching profession.), and the ninth item (I regularly participate with other teachers and educators to exchange skills and knowledge to improve teaching and learning activities.)

Table 15 Comparison of the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia as classified by Gender of teachers in Professional Ethics

Item. No	Measures of professional ethics dimension of teachers' competencies	Male (n= 152)		Female (n= 96)		t	sig.
		$\bar{X}$	S.D.	$\bar{X}$	S.D.		
1	I am personally and professionally self-disciplined to enhance the vision of educational, economic, social, and political developments.	3.93	0.79	3.82	0.74	1.11	0.80
2	I enjoy harmonious relationships with students and the community.	4.24	0.68	4.16	0.74	0.88	0.62
3	I have commitment, love, faith, honesty, and responsibility to the teaching profession and organizations.	4.34	0.70	4.49	0.68	-1.63	0.97
4	I solve the problems of students, colleagues, and other members of the community with fairness and transparency.	4.13	0.71	4.13	0.77	0.00	0.53
5	I care for students and treat them with love, compassion, concern, help, and support.	4.24	0.67	4.31	0.72	-0.77	0.37
6	I demonstrate as a positive role model for my students physically, verbally, and psychologically.	4.21	0.72	4.26	0.70	-0.54	0.90
7	I provide teaching and services equally and sincerely without requesting or accepting the benefits through the abuse of little and position.	4.23	0.76	4.33	0.69	-1.08	0.58
8	I apply my leadership skills in other fields that involve economic, societal, and religious, art and cultural, environmental development, etc.	3.95	0.72	3.79	0.72	1.66	0.22

Item. No	Measures of professional ethics dimension of teachers' competencies	Male (n= 152)		Female (n= 96)		t	sig.
		$\bar{X}$	S.D.	$\bar{X}$	S.D.		
9	I am committed to my role and duty to promote the creation of learning, skills, and good habits to all students without discrimination in any dimension.	4.33	0.67	4.39	0.73	-0.63	0.41
	Total	**4.18**	**0.58**	**4.19**	**0.57**	**-0.12**	**0.79**

Table 15 shows that the differences in gender of secondary school teachers had no significant difference at the level 0.05, (p=0.00<0.05) on Professional Ethics of the current state of teachers' competencies.

Comparison of the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia as classified by Level of Degree of teachers

Table 16 Comparison of the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia as classified by Level of the degree of teachers

Teachers' Competencies	Bachelor (n= 225)		Higher Bachelor (n= 23)		t	Sig.
	$\bar{X}$	S.D.	$\bar{X}$	S.D.		
Professional Knowledge	3.41	0.53	3.75	0.61	-2.85	0.29
Professional Practice	3.66	0.52	3.82	0.56	-1.34	0.53
Professional Development	3.80	0.55	3.96	0.58	-1.32	0.69
Professional Ethics	4.16	0.58	4.35	0.51	-1.47	0.48
Total	**3.71**	**0.47**	**3.93**	**0.52**	**-2.10**	**0.28**

Table 16 shows that the overall differences in the level of degree of secondary school teachers had no significant difference at the level 0.05, (p=0.00<0.05) on the current state of teachers' competencies.

Table 17 Comparison of the current state of teachers' competencies in secondary
schools in Prey Veng province, Cambodia as classified by Level of the
degree of teachers on Professional Knowledge

Item. No	Professional knowledge dimension of teachers' competencies	Bachelor (n= 225)		Higher bachelor (n= 23)		t	sig.
		$\bar{X}$	S.D.	$\bar{X}$	S.D.		
1	I know clearly about students' family status involving social and economic backgrounds, disability, and ethnicity.	3.01	0.90	3.39	0.89	-1.92	0.27
2	I know the factors and problems that affect students' learning and deal with them effectively.	3.32	0.74	3.61	0.66	-1.77	0.63
3	I understand well about students' learning needs, capacity, interests, issues, and concerns.	3.50	0.77	3.87	0.76	-2.19	0.57
4	I understand well about students' learning styles and attitudes and how they learn.	3.62	0.73	4.09	0.85	-2.87	0.25
5	I know the educational philosophy, policies, and national education goals.	3.26	0.83	3.70	0.93	-2.39	0.50
6	I am aware of educational assessment, measurement, and evaluation.	3.22	0.79	3.39	0.89	-0.99	0.25
7	I am aware of educational research, innovation and creation, and information technology.	3.18	0.77	3.39	0.94	-1.24	0.15
8	I have knowledge of curriculum content, curriculum development and am able to explain and teach it well.	3.47	0.74	3.61	0.89	-0.83	0.16

Item. No	Professional knowledge dimension of teachers' competencies	Bachelor (n= 225)		Higher bachelor (n= 23)		t	sig.
		$\bar{X}$	S.D.	$\bar{X}$	S.D.		
9	I understand well about the subject matter and am able to explain and teach it well.	3.93	0.71	4.13	0.76	-1.26	0.34
10	I understand well to prepare the lesson plan and implement it effectively.	3.85	0.71	4.13	0.69	-1.78	0.98
11	I have knowledge of connecting content from one subject to another well.	3.48	0.74	3.74	0.81	-1.58	0.47
12	I have knowledge of foreign languages and technology.	2.98	0.95	3.52	0.90	-2.60	0.57
13	I have knowledge of psychology and communication skills.	3.12	0.83	3.61	0.84	-2.68	0.27
14	I can set up and make facilitative activities in the context of learning.	3.46	0.69	3.78	0.74	-2.13	0.98
15	I have knowledge in managing classroom and learning activities.	3.80	0.66	4.30	0.64	-3.50	0.82
	Total	**3.41**	**0.53**	**3.75**	**0.61**	**-2.85**	**0.29**

Table 17 shows that the differences in gender of secondary school teachers had no significant difference at the level 0.05, (p=0.00<0.05) on Professional Knowledge of the current state of teachers' competencies.

Table 18 Comparison of the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia as classified by Level of the degree of teachers on Professional Practice

Item. No	Professional practice dimension of teachers' competencies	Bachelor (n= 225)		Higher bachelor (n= 23)		t	sig.
		$\bar{X}$	S.D.	$\bar{X}$	S.D.		
1	I prepare a correct and effective teaching curriculum to achieve student learning outcomes.	3.67	0.67	3.83	0.78	-1.05	0.33
2	I prepare correct and effective lesson plans and use appropriate learning materials to achieve student learning outcomes.	3.58	0.69	3.70	0.82	-0.77	0.23
3	I use both formative and summative assessment tools to assess students learning and learning outcomes.	3.51	0.79	3.65	0.83	-0.84	0.94
4	I provide feedback to students, parents, or guardians about the progress of students' knowledge, skills, and attitudes.	3.31	0.78	3.22	1.00	0.53	0.11
5	I maintain a record of students' participation, their progress, and quality development.	3.33	0.77	3.70	0.97	-1.75	0.04*
6	I create a safe learning environment, encourage and help students to increase their responsibilities in learning.	3.71	0.74	3.70	0.64	0.07	0.46
7	I participate in school development projects to support the learning and welfare of students and colleagues.	3.83	0.74	3.91	0.90	-0.49	0.17

Item. No	Professional practice dimension of teachers' competencies	Bachelor (n= 225)		Higher bachelor (n= 23)		t	sig.
		$\bar{X}$	S.D.	$\bar{X}$	S.D.		
8	I provide opportunities and encourage students to share their innate talents.	4.01	0.70	4.22	0.67	-1.36	0.45
9	I provide students opportunities to learn and overcome challenges as well as critical and creative thinking.	3.81	0.70	3.78	0.67	0.17	0.92
10	I apply innovative teaching methods and approach to facilitate students' learning and to meet national curriculum standards.	3.56	0.71	3.83	0.58	-2.09	0.01*
11	I use the information and communications technology to make teaching and learning more effective.	3.61	0.76	3.87	0.87	-1.52	0.62
12	I build trusting relationships with students to make them involved in teaching and learning.	3.78	0.70	4.09	0.67	-1.99	0.36
13	I set the classroom rules for students to follow which encourage them to participate in teaching and learning activities.	3.91	0.74	4.13	0.69	-1.36	0.93
	Total	**3.66**	**0.52**	**3.82**	**0.56**	**-1.34**	**0.53**

Note: * Level of significance at p<.05

Table 18 shows that the differences in the level of degree of secondary school teachers had no significant difference at the level 0.05, (p=0.00<0.05) on Professional Practice of the current state of teachers' competencies. However, there was a significant difference shown at 0.05, (p=0.00<0.05) for the fifth item (I

maintain a record of students' participation, their progress, and the quality development.), and the tenth item (I apply innovative teaching methods and approach to facilitate students' learning and to meet national curriculum standards.)

Table 19 Comparison of the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia as classified by Level of the degree of teachers on Professional Development

Item. No	Professional development dimension of teachers' competencies	Bachelor (n= 225)		Higher bachelor (n= 23)		t	sig.
		$\overline{X}$	S.D.	$\overline{X}$	S.D.		
1	I regularly evaluate my teaching and plan for personal professional development.	3.65	0.74	3.70	0.82	-0.26	0.50
2	I study to develop IT knowledge and skills, and instructional media that can be applied to enhance the teaching and learning process.	3.65	0.81	4.22	0.74	-3.23	0.42
3	I seek and read educational articles and research for personal and professional development.	3.70	0.74	4.00	0.85	-1.85	0.87
4	I read research studies and articles about specialized instructional techniques to improve the teaching profession.	3.65	0.72	3.83	0.72	-1.10	0.60
5	I conduct action research to broaden knowledge and improve teaching and learning.	3.80	0.71	4.00	0.67	-1.29	0.13
6	I uphold positive relationships with students, parents, colleagues, and stakeholders in the community.	3.99	0.79	4.13	0.76	-0.83	0.88

Item. No	Professional development dimension of teachers' competencies	Bachelor (n= 225)		Higher bachelor (n= 23)		t	sig.
		$\bar{X}$	S.D.	$\bar{X}$	S.D.		
7	I regularly interact with other teachers in practicing academic and professional learning activities for the development of the teaching profession.	3.97	0.71	4.09	0.85	-0.62	0.04*
8	I regularly collaborate with other teachers to share best practices to improve teaching and learning and drive student achievement.	3.96	0.74	3.91	0.73	0.32	0.78
9	I regularly participate with other teachers and educators to exchange skills and knowledge to improve teaching and learning activities.	3.82	0.70	3.78	0.74	0.26	0.49
10	I regularly discuss with administrators and other teachers about student-learning results to identify strategies to help their learning.	3.80	0.74	3.96	0.82	-0.93	0.99
	Total	**3.80**	**0.55**	**3.96**	**0.58**	**-1.32**	**0.69**

Note: * Level of significance at p<.05

Table 19 shows that the differences in the level of degree of secondary school teachers had no significant difference at the level 0.05, (p=0.00<0.05) on Professional Development of the current state of teachers' competencies. However, there was a significant difference at 0.05, (p=0.00<0.05) for the seventh item (I regularly interact with other teachers in practicing academic and professional learning activities for the development of the teaching profession.)

Table 20 Comparison of the current state of teachers' competencies in secondary
schools in Prey Veng province, Cambodia as classified by Level of the
degree of teachers on Professional Ethics

Item. No	Measures of professional ethics dimension of teachers' competencies	Bachelor (n= 225)		Higher bachelor (n= 23)		t	sig.
		$\bar{X}$	S.D.	$\bar{X}$	S.D.		
1	I am personally and professionally self-disciplined to enhance the vision of educational, economic, social, and political developments.	3.87	0.76	4.09	0.85	-1.28	0.21
2	I enjoy harmonious relationships with students and the community.	4.19	0.70	4.39	0.72	-1.33	0.46
3	I have commitment, love, faith, honesty, and responsibility to the teaching profession and organizations.	4.39	0.70	4.47	0.67	-0.57	0.83
4	I solve the problems of students, colleagues, and other members of the community with fairness and transparency.	4.11	0.74	4.30	0.70	-1.23	0.74
5	I care for students and treat them with love, compassion, concern, help, and support.	4.26	0.70	4.39	0.58	-0.89	0.53
6	I demonstrate as a positive role model for my students physically, verbally, and psychologically.	4.20	0.71	4.48	0.67	-1.77	0.91
7	I provide teaching and services equally and sincerely without requesting or accepting the benefits through the abuse of little and position.	4.25	0.73	4.48	0.73	-1.43	0.87
8	I apply my leadership skills in other fields that involve economic, societal, and religious, art and cultural, environmental development, etc.	3.88	0.73	4.00	0.67	-0.79	0.18

Item. No	Measures of professional ethics dimension of teachers' competencies	Bachelor (n= 225)		Higher bachelor (n= 23)		t	sig.
		$\bar{X}$	S.D.	$\bar{X}$	S.D.		
9	I am committed to my role and duty to promote the creation of learning, skills, and good habits to all students without discrimination in any dimension.	4.33	0.71	4.52	0.51	-1.24	0.10
	Total	4.16	0.58	4.35	0.51	-1.47	0.48

Table 20 shows that the differences in the level of degree of secondary school teachers had no significant difference at the level 0.05, (p=0.00<0.05) on Professional Ethics of the current state of teachers' competencies.

Part 4 Study guidelines for improving and enhancing teachers' competencies in secondary schools in Prey Veng province, Cambodia

Table 21 Guidelines for improving and enhancing teachers' competencies in secondary schools in Prey Veng province, Cambodia: Professional Knowledge

Questions/ Issues	Expert 1	Expert 2	Expert 3	Summary
Guidelines for improving teachers' competencies to improve professional knowledge.	Actively/daily interacting and observing students		Stay a long time at school	1. Teachers should spend most of the time staying at schools and be active or daily interacting and observing students.
	Interact with parents and community	Get to know the students and help them to learn	Help students to learn and discuss with parents	2. Staying connected and discussing with students, parents,

Questions/ Issues	Expert 1	Expert 2	Expert 3	Summary
	Interacting and observing students		Closely connect to community	and community help teachers to get to know students and their needs, help them to learn effectively and easy to teach.
	Study students' background Include socio-cultural backgrounds, linguistics, cultural, religious, interests, needs, experiences, social intellectual, physical development, characteristics.			3. It would be essential for teachers to study students' backgrounds which include linguistic, cultural, and religious background, interest, needs, experience, social, intellectual, physical development, and characteristics.
	Gives a form for them to complete to get their personal information Interact and observe them more			4. Every academic year teachers can distribute personal information form to them to complete and confirm that it is correct and then can interact and observe them more.
		Understand education trends and policies and curriculum	Select the best one to be a teacher.	5. A person who will be selected to be a teacher must have good

Questions/ Issues	Expert 1	Expert 2	Expert 3	Summary
			They are good at knowledge and practice	knowledge and practice, be aware of educational trends and policies, and curriculum.
	teaching strategy: should be broadened on digital literacy, short or long training courses, study tours, workshops,	Keep myself updated on local, national, regional, and global development		5. Teachers should update and broaden knowledge on local, national, and globally such as teaching strategy on digital literacy through classroom research and professional development by joining short or long training courses, study tours, workshops, etc.
	Ongoing professional development, on SET or service teacher training focuses on subject matters, curriculums, understanding fundamental concepts, structure and inquiry process,		support teachers in all things	6. ongoing professional development should be provided on SET or service teacher training because it focuses on subject matters, curriculums, understanding fundamental concepts, structure, and

Questions/ Issues	Expert 1	Expert 2	Expert 3	Summary
				inquiry process. Schools should support teachers in all things.
			Stay at school and help students with their work, test, etc.	7. Teachers should have much time staying at school for helping students with their homework, tests, etc.
	follow and do a checklist	- Engage the community - Involve the community to help students learn- Partner with parents and caregivers-	communicate with community	8. Keeping engagement, communication, and involvement with parents and caregivers, and community to help students learn. Following and doing a checklist should be done to keep students involved.
	regular observing student learning styles do an assessment on what they have learned	Encourage and respect diversity	create a conducive environment for students	10. Teachers should also encourage and respect diversity, create a conducive environment for students, regularly observing on their learning styles, and assessing on what they have learned and their proficiency.

Table 21 provides a list of guidelines to improve and enhance teachers' competencies in secondary schools, Cambodia in Professional Knowledge.

The experts shared as follows:

1. Teachers should spend most of the time staying at schools and be active or daily interacting, observing students.

2. Teachers should stay connected and discuss with students, parents, and the community to help teachers to get to know students and their needs, help them to learn effectively, and easy to teach.

3. It would be essential for teachers to study students' backgrounds which include linguistic, cultural, and religious background, interest, needs, experience, social, intellectual, physical development, and characteristics.

4. Every academic year teachers can distribute personal information form to them to complete and confirm that it is correct and then can interact and observe them more.

5. A person who will be selected to be a teacher must have good knowledge and practice, be aware of educational trends and policies, and curriculum.

6. Teachers should update and broaden knowledge on local, national, and globally such as teaching strategy on digital literacy through classroom research and professional development by joining short or long training courses, study tours, workshops, etc.

7. Ongoing professional development should be provided on SET or service teacher training because it focuses on subject matters, curriculums, understanding fundamental concepts, structure, and inquiry process. Schools should support teachers in all things.

8. Teachers should have much time staying at school for helping students with their homework, tests, etc.

9. Teachers should keep engagement, communication, and involvement with parents and caregivers, and the community to help students learn. Following and doing a checklist should be done to keep students involved.

10. Teachers should also encourage and respect diversity, create a conducive environment for students, regularly observing on their learning styles, and assessing on what they have learned and their proficiency.

Table 22 Guidelines for improving and enhancing teachers' competencies in secondary schools in Prey Veng province, Cambodia: Professional Practice

Questions/ Issues	Expert 1	Expert 2	Expert 3	Summary
Guidelines for improving teachers' competencies to improve professional practice.			it demands teachers to have content knowledge, know students, know content to teach a teacher has will in teaching	1. Teachers should have strong content knowledge, know students, and content to teach, and be willing to teach.
	should apply PDCA model: operate effectively all stages of teaching cycles including developing learning programs, teaching assessments, providing feedback on students, and reporting to parents,	Evaluate own teaching regularly		2. Teacher should regularly evaluate his/her teaching through implementing (PDCA model) and operate effectively at all stages of the teaching and learning cycle including planning for learning assessment, development learning programs, teaching, assessing, and providing feedback on students learning and reporting to parents.

Questions/ Issues	Expert 1	Expert 2	Expert 3	Summary
		should create or maintain a safe, inclusive, challenging learning environment,	strengthen discipline in school	3. Schools should create and maintain a safe, inclusive, challenging learning environment, and strengthen school disciplines.
		Improve relationship with students and parents, guidance, colleagues	school and community must connect and work together closely	4. Teachers must be active and improve the relationship with students and parents, guidance, colleagues and ensure that school and community are closely connected and work together to create a conducive environment for teaching practice.
	The repertoire of effective teaching strategies and use them to implement well-designed teaching programs and lessons.			5. Teachers should repertoire of effective teaching strategies and use them to implement well-designed teaching programs and lessons.

Questions/ Issues	Expert 1	Expert 2	Expert 3	Summary
	Skills of effective teaching strategies should practice and try to update new			6. Skills of effective teaching strategies should practice and try to update new.
	Should do PLC: allow all teachers to join together to discuss teaching, problems, weakness, and take it to redesign on the lesson plan			7. School should do a Professional Learning Community (PLC) which allows all teachers to join together to discuss teaching, problems, weakness, and take it to redesign on a lesson plan.
	Use student assessment and observation to analyze the students' success and challenges. Evaluate all aspects of teaching practice regularly to ensure they respond to students' needs and interests			8. It would be helpful when teachers use student assessment and observation to analyze the students' success and challenges, and should also evaluate all aspects of teaching practice regularly to ensure they respond to student needs and interests.

Table 22 provides a list of guidelines to improve and enhance teachers' competencies in secondary schools, Cambodia in Professional Practice.

The experts shared as follows:

1. teachers should have strong content knowledge, know students, and content to teach, and be willing to teach.

2. Teachers should regularly evaluate their teaching through implementing (the PDCA model) and operate effectively at all stages of the teaching and learning cycle including planning for learning assessment, development learning programs, teaching, assessing, and providing feedback on students learning, and reporting to parents.

3. Schools should create and maintain a safe, inclusive, challenging learning environment, and strengthen school disciplines.

4. Teachers must be active and improve the relationship with students and parents, guidance, colleagues and ensure that school and community are closely connected and work together to create a conducive environment for teaching practice.

5. Teachers should repertoire of effective teaching strategies and use them to implement well-designed teaching programs and lessons.

6. Skills of effective teaching strategies should practice and try to update new.

7. School should do a Professional Learning Community (PLC) which allows all teachers to join together to discuss teaching, problems, weakness, and take it to redesign on a lesson plan.

8. It would be helpful when teachers use student assessment and observation to analyze the students' success and challenges, and should also evaluate all aspects of teaching practice regularly to ensure they respond to student needs and interests.

Table 23 Guidelines for improving and enhancing teachers' competencies in secondary schools in Prey Veng province, Cambodia: Professional Development

Questions/ Issues	Expert 1	Expert 2	Expert 3	Summary
Guidelines for improving teachers' competencies to improve professional development.	Classroom action research Self-planned and explore more knowledge with academic books and articles. It is autonomous learning.			1. teachers should conduct classroom action research, self-planned, and explore more knowledge with academic books and articles which is autonomous learning.
		Observe other teachers teach to gain experience	Can learn from their work and other teachers. Connect to other schools in exchanging experience, teachers,	2. They also can learn from work and connect to other schools and teachers in exchanging experience.
			Provide teacher opportunity to get CPD through courses, scholarship… School principals should know teacher competency	3. School principals should know teacher competency and provide them the opportunity to get continuous professional development (CPD) through courses and scholarships.

Questions/ Issues	Expert 1	Expert 2	Expert 3	Summary
		Observe other teachers teach to gain experience	discuss and work with community	4. Teachers should observe other teachers teaching to gain experience, discuss and work with the community.
	the study tour, short-term training, get a scholarship to continue studying is the key to enhancing professional development.		give the teacher the opportunity to learn	5. The study tour, participating events, short and long-term training via scholarship program to continue study is the key to enhancing professional development.
	participation in the events, teaching, and improving programs such as PLC, study tours, short-term training, get a scholarship to continue studying is the key to enhancing professional development.		give chance for them to take responsibility for work

open up

share goals to all teachers | 6. Schools should facilitate PLC for improving teaching and programs, and give a chance for the teacher to take responsibility for work, open up and share goals with all teachers. |

Table 23 provides a list of guidelines to improve and enhance teachers' competencies in secondary schools, Cambodia in Professional Development.

The experts shared as follows:

1. Teachers should conduct classroom action research, self-planned, and explore more knowledge with academic books and articles which is autonomous learning.

2. Teachers also can learn from work and connect to other schools and teachers in exchanging experience.

3. School principals should know teacher competency and provide them the opportunity to get continuous professional development (CPD) through courses and scholarships.

4. Teachers should observe other teachers teaching to gain experience, discuss and work with the community.

5. Teachers can enhance professional development through study tours, participating events, short and long-term training via scholarship programs which is the key to the continuing study.

6. Schools should facilitate PLC for improving teaching and programs, and give a chance for the teacher to take responsibility for work, open up and share goals with all teachers.

Table 24 Guidelines for improving and enhancing teachers' competencies in secondary schools in Prey Veng province, Cambodia: Professional Ethics

Questions/ Issues	Expert 1	Expert 2	Expert 3	Summary
Guidelines for improving teachers' competencies to improve professional ethics.	A teacher must be a strong role model of characteristics such as honesty, respect, love, fairness, patience, unity.	Demonstrate a positive model of ethical behavior	Do role model for all	1. Teachers should demonstrate a strong or positive role model, ethical behavior, characteristics such as honesty, respect, love fullness, fairness, patience, unity, and must have disciplined action.
	Treat students with kindness, respect without showing any favoritism, partiality, have responsibility. show affections, love, connect to students, care for them, create good relationships with them.	Caring for students and working in the interest of students and the community		2. They should treat students with kindness, respect without showing any favoritism, partiality, have a responsibility, show affection, love, connect to students and create a good relationship with them, and work in the interest of students and the community.

Questions/ Issues	Expert 1	Expert 2	Expert 3	Summary
	their roles fulfill student's needs, aspirations of learners,	Use fairness and transparency to deal with students and other colleagues Demonstrate commitment and responsibility for teaching the profession		3. Their roles fulfill students' needs, aspirations of learners, transparency, justice, and demonstrate commitment and responsibility for the teaching profession.
	they should respect the privacy of other teachers, maintain confidentiality, not talk bad of other teachers, or inside the organization.			4. Teachers should respect the privacy of other teachers, maintain confidentiality, not talk badly of other teachers, or inside the organization.
		Use fairness and transparency to deal with students and other colleagues	must have discipline-action, transparency, justice, reward to them leaders make friends with teachers …	5. Using fairness and transparency to deal with other colleagues. School should also make a good relationship among teachers and leaders, and an active and good teacher should be motivated praised, and rewarded.

Table 24 provides a list of guidelines to improve and enhance teachers' competencies in secondary schools, Cambodia in Professional Ethics.

The experts shared as follows:

1. Teachers should demonstrate a strong or positive role model, ethical behavior, characteristics such as honesty, respect, love fullness, fairness, patience, unity, and must have disciplined action,

2. Teachers should treat students with kindness, respect without showing any favoritism, partiality, have a responsibility, show affection, love, connect to students and create a good relationship with them, and work in the interest of students and the community.

3. Their roles fulfill students' needs, aspirations of learners, transparency, justice, and demonstrate commitment and responsibility for the teaching profession.

4. Teachers should respect the privacy of other teachers, maintain confidentiality, not talk badly of other teachers, or inside the organization.

5. Teachers should use fairness and transparency to deal with other colleagues. School should also make a good relationship among teachers and leaders, and an active and good teacher should be motivated praised, and rewarded.

CHAPTER V
CONCLUSION

This chapter presents the main purposes of this research, a summary of research, methodology, findings, and recommendation.

The objectives of this research were as follows:

1. To study and compare the current state of teachers' competencies in secondary schools, Cambodia

2. To study guidelines for improving and enhancing teachers' competencies in secondary schools, Cambodia

The researcher conducted this study by using a standard mixed model technique, which includes both qualitative and quantitative research approaches. The quantitative method was used in the first stage of the research, whereas the qualitative method was used in the second stage.

The target sample for the first step was calculated through the use of Krejcie and Morgan (1970) table which consisted of 248 secondary school teachers working in schools in Prey Veng province, Cambodia in the academic year 2021. The method utilized by the researcher was stratified random sampling.

The target group for the second step was three experts from teacher training colleges, teacher training, and development, and school administrators who had experience more years in the field of teacher training and development were invited for interviewing guidelines to improve and enhance teachers' competencies. They were selected by using the purposive sampling method.

The questionnaire form with structured questions and semi-structured interviews based on the literature review were the instruments employed in this study. The response method was a rating scale, and the expert was requested to share his or her opinions and suggestions in the field of teacher training and development through a structured interview with semi-structured or open-ended questions.

For analyzing the demographic information of participants, the researcher used frequency and percentage. Arithmetic means ($\overline{X}$) and standard deviation (S.D) was used to analyze the current state of teachers' competencies comprised of four aspects. To compare by gender and level of degree of the current state of teachers'

competencies used t-test independent. The data gathered from the interview session was analyzed by content analysis.

Research Findings

    1. The current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia

    The overall current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia

    The result indicated that the overall level of the current state of teachers' competencies in secondary schools, in Cambodia was at a high level. The respondents' level of the current state of teachers' competencies on Professional Practice, Professional Development, and Professional Ethics was indicated at a high level while Professional Knowledge was shown at a moderate level. While examined in aspect, it was found that the highest mean was 'Professional Ethics, and the lowest mean was 'Professional Knowledge. The overall mean of the current state of teachers' competencies was at a high level.

    The overall current state of teachers' competencies on Professional Knowledge

    The result indicated that the respondents' overall level of the current state of teachers' competencies of Professional Knowledge was at a moderate level.

    When examined in aspect, it was found that the highest mean was about "I understand well about the subject matter and be able to explain and teach it well.", and the lowest mean was "I have knowledge of foreign languages and technology".

    The overall current state of teachers' competencies on Professional Practice

    The result indicated that the respondents' overall level of the current state of teachers' competencies of Professional Practice was at a high level. When examined in aspect, it was found that the highest mean was about 'I provide opportunities and encourage students to share their innate talents, and the lowest mean was about I provide feedback to students, parents, or guardians about the progress of students' knowledge, skills, and attitudes.

The overall current state of teachers' competencies on Professional Development

The result indicates that the respondents' overall level of the current state of teachers' competencies of Professional Development was at a high level. When examined in aspect, it was found that the highest mean was about 'I uphold positive relationship with students, parents, colleagues, and stakeholders in the community, and the lowest mean was about I regularly evaluate my teaching and plan for personal professional development.

The overall current state of teachers' competencies on Professional Ethics

The result indicates that the respondents' overall level of the current state of teachers' competencies of Professional Ethics was at a high level. When examined in aspect, it was found that the highest mean was about 'I have commitment, love, faith, honesty, and responsibility to the teaching profession and organizations, and the lowest mean was about 'I am personally and professionally self-disciplined to enhance the vision of educational, economic, social, and political developments' and 'I apply my leadership skills in other fields that involve economic, societal and religious, art and cultural, and environmental development, etc.'

2. The comparison of the current state of teachers' competencies in secondary schools, Cambodia as classified by Gender and Level of Degree of teachers

Comparison of the current state of teachers' competencies in secondary schools, Cambodia as classified by Gender of teachers

The research result revealed that it did not have significant differences on the overall difference in gender of the current state of teachers' competencies in secondary schools, Cambodia.

1. The result showed that the overall differences in gender of secondary school teachers had no significant difference on the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia

2. The result showed that the differences in gender of secondary school teachers had no significant difference on Professional Knowledge of the current state of teachers' competencies. However, there was a significant difference for the fourth

item (I understand well about students' learning styles and attitudes and how they learn.)

3. The result showed that the differences in gender of secondary school teachers had no significant difference on Professional Practice of the current state of teachers' competencies. However, there was a significant difference for the fifth item (I maintain a record of students' participation, their progress, and the quality development.).

4. The result showed that the differences in gender of secondary school teachers had no significant difference on Professional Development of the current state of teachers' competencies. However, there was a significant difference for the fifth item (I conduct action research to broaden knowledge and improve on teaching and learning.), seventh item (I regularly interact with other teachers in practicing academic and professional learning activities for the development of the teaching profession.), and the ninth item (I regularly participate with other teachers and educators to exchange skills and knowledge to improve teaching and learning activities.)

Moreover, the research finding revealed that it did not have the significant differences in Professional Knowledge, Professional Practice, Professional Development, and Professional Ethics of the current state of teachers' competencies in schools as categorized by gender of teachers.

Comparison of the current state of teachers' competencies in secondary schools, Cambodia as classified by Level of Degree of teachers

The result showed that the overall differences in the level of degree of secondary school teachers had no significant difference in the current state of teachers' competencies.

1. The result showed that the differences in gender of secondary school teachers had no significant difference on Professional Knowledge of the current state of teachers' competencies.

2. The result showed that the differences in the level of degree of secondary school teachers had no significant difference on Professional Practice of the current state of teachers' competencies. However, there was a significant difference shown for the fifth item (I maintain a record of students' participation, their

progress, and the quality development.), and the tenth item (I apply innovative teaching methods and approaches to facilitate students' learning and to meet national curriculum standards.)

3. The result showed that the differences in the level of degree of secondary school teachers had no significant difference on Professional Development of the current state of teachers' competencies. However, there was a significant difference for the seventh item (I regularly interact with other teachers in practicing academic and professional learning activities for the development of the teaching profession.)

4. The finding showed that the differences in the level of degree of secondary school teachers had no significant difference at the level) on Professional Ethics of the current state of teachers' competencies.

Moreover, the research finding revealed that it did not have the significant differences in Professional Knowledge, Professional Practice, Professional Development, and Professional Ethics of the current state of teachers' competencies in schools as categorized by levels of degree of teachers.

3. The guidelines to improve and enhance teachers' competencies in secondary schools in Prey Veng province, Cambodia

The guidelines for improving and enhancing teachers' competencies in secondary schools, in Cambodia were derived from the interview with 3 educational experts. And the findings from this interview session can be used and served as the guidelines to improve and enhance teachers' competencies in secondary schools in Prey Veng province, Cambodia

3.1 Guidelines for improving and enhancing teachers' competencies in secondary schools, Cambodia: Professional Knowledge

The findings generated from the interview on (Professional Knowledge) indicated that to improve and enhance the competencies teachers should:

3.1.1 study students' backgrounds including linguistic, cultural, and religious background, interest, needs, experience, social, intellectual, physical development, and characteristics.

3.1.2 have good knowledge and practice, be aware of educational trends and policies, and curriculum.

3.1.3 update and broaden knowledge on local, national, and globally such as teaching strategy on digital literacy through classroom research and professional development by joining short or long training courses, study tours, workshops, etc.

3.1.4 join ongoing professional development because it focuses on subject matters, curriculums, understanding fundamental concepts, structure, and inquiry process.

3.1.5 keep engagement, communication, and involvement with parents and caregivers, and the community to help students learn.

3.1.6 create a conducive environment for students, regularly observing their learning styles.

3.2 Guidelines for improving and enhancing teachers' competencies in secondary schools, Cambodia: Professional Practice

The findings generated from the interview on (Professional Practice) indicated that to improve and enhance the competencies teachers should:

3.2.1 have strong content knowledge, know students, and content to teach, and be willing to teach.

3.2.2 regularly evaluate teaching through implementing (the PDCA model) and operating effectively at all stages of the teaching and learning cycle

3.2.3 Schools should create and maintain a safe, inclusive, challenging learning environment, and strengthen school disciplines.

3.2.4 ensure that school and community are closely connected and work together to create a conducive environment for teaching practice.

3.2.5 repertoire of effective teaching strategies and use them to implement well-designed teaching programs and lessons.

3.2.6 Skills of effective teaching strategies should practice and try to update new.

3.2.7 do a Professional Learning Community (PLC) which allows all teachers to join together to discuss teaching, problems, weakness, and take it to redesign a lesson plan.

3.2.8 also evaluate all aspects of teaching practice regularly to ensure they respond to student needs and interests.

3.3 Guidelines for improving and enhancing teachers' competencies in secondary schools, Cambodia: Professional Development

The findings generated from the interview on (Professional Development) indicated that to improve and enhance the competencies teachers should:

3.3.1 conduct classroom action research, self-planned, and explore more knowledge with academic books and articles which is autonomous learning.

3.3.2 also learn from work and connect to other schools and teachers in exchanging experience.

3.3.3 School principals should know teacher competency and provide them the opportunity to get continuous professional development (CPD) through courses and scholarships.

3.3.4 observe other teachers' teaching to gain experience, discuss and work with the community.

3.3.5 enhance professional development through study tours, participating events, short and long-term training via the scholarship program.

3.3.6 Schools should facilitate PLC for improving teaching and programs, and give a chance for the teacher to take responsibility for work, open up and share goals with all teachers.

3.4 Guidelines for improving and enhancing teachers' competencies in secondary schools, Cambodia: Professional Ethics

The findings generated from the interview on (Professional Ethics) indicated that to improve and enhance the competencies teachers should:

3.4.1 demonstrate a strong or positive role model, ethical behavior, characteristics such as honesty, respect, love fullness, fairness, patience, unity, and must have disciplined action.

3.4.2 treat students with kindness, respect without showing any favoritism, partiality, have a responsibility, show affection, love, connect to students and create a good relationship with them, and work in the interest of students and the community.

3.4.3 their roles fulfill students' needs, aspirations of learners, transparency, justice, and demonstrate commitment and responsibility for the teaching profession.

3.4.4 respect the privacy of other teachers, maintain confidentiality, not talk badly of other teachers, or inside the organization.

3.4.5 use fairness and transparency to deal with other colleagues. School should also make a good relationship among teachers and leaders, and an active and good teacher should be motivated praised, and rewarded.

Discussion

The discussion of the research findings in this study has key issues to discuss as the following:

1. To study the current state of teachers' competencies in secondary schools, Cambodia

The overall level of the current state of teachers' competencies in secondary schools was at a high level. When considered in aspects Professional Knowledge was at a moderate level. This finding supported a study conducted by No and Heng (2017) that teacher education had not been standardized yet compared to regional and international practices. They stated that pre-service teacher training needs to equip K-12 teachers and at least a bachelor's degree holder whereas in-service teacher training needs to upgrade teachers' professional knowledge and skills to enable and adapt themselves to the global teaching and learning environment. And the rest aspects were professional practice, professional development, and professional ethics were at a high level. This finding corroborated the finding by Tan and Tee (2012) that because of structuring teacher education and professional learning exists in Cambodia and teacher training colleges, teachers in Cambodia today have learned much new knowledge, skills, and theories which help them to be better qualified and trained to compare to a few decades ago where teachers have not received formal training and learned from practical apprenticeship.

2. Comparison of the current state of teachers' competencies in secondary schools, Cambodia as classified by Gender and Level of Degree of teachers

The results analysis of comparison of the current state of teachers' competencies in secondary schools, Cambodia as classified by gender and level of degree revealed that there were no significant differences in Professional Knowledge, Professional Practice, Professional Development, and Professional Ethics. The overall difference in gender and level of degree of teachers showed had no difference in teachers' competencies. The results showed that it was a null hypothesis that has no statistical significance between the variables. So, it does not affect the current state of teachers' competencies in secondary schools, in Cambodia.

2.1 Comparison of the current state of teachers' competencies in secondary schools, Cambodia as classified by Gender of teachers

The result found that the overall differences in gender of secondary school teachers had no significant difference in the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia. Phin (2017) stated that because of the INSET program's proper structure, influential policies, actionable processes, and long-term practice, teachers become more aware of the importance of CPD in their schools or school clusters. No and Heng (2017) expressed that to promote gender equity in Cambodia and to achieve organizational goals, an organization cooperates with some departments in MoEYS to provide training courses to teachers so that they can use the knowledge to reduce gender disparity in education. This reflects that both gender of teachers got equal opportunities to improve, upgrade, and develop their competencies which lead them to have similar knowledge and skills.

2.2 Comparison of the current state of teachers' competencies in secondary schools, Cambodia as classified by Level of Degree of teachers

The result showed that the overall differences in the level of degree of secondary school teachers had no significant difference on the current state of teachers' competencies. Because the Ministry of Education formed the new teacher policy and teacher policy action plan (TPAP). In these policies, the ministry and relevant stakeholders work closely to build institutional credit-system in-service

training. Through this, in-service teachers with a low degree got training programs and credits. This leads them to have better knowledge, skills, competencies. The plan is used as a center for teacher development, and in-service training for the program for teachers (No & Heng, 2017).

3. The Guidelines for improving and enhancing teachers' competencies in secondary schools, Cambodia

Guidelines for improving and enhancing teachers' competencies have been found imperative and effective to improve and enhance teachers' competencies. The experts indicated that in-service teacher training (INSET) is useful for continuous professional development because it focuses on the subject matter, curriculums, understanding fundamental concepts, structure, and inquiry process. It supports the finding of Phin (2017) that more than 85 % of respondents' answers were very useful on the in-service teacher training. She stated that it was a positive awareness and recognition of respondents' perspectives towards the significance and effectiveness of the INSET program in terms of their professional development as well as improving teachers' quality and status.

To improve and enhance competency in professional practice the experts identified that schools should facilitate Professional Learning Community (PLC) for improving teaching and programs, and give a chance for the teacher to take responsibility for work, open up and share goals with all teachers. It is in agreement with Hairon (2020) that PLC is an effective approach in establishing a conducive and collaborative environment in schools where teachers can learn and work together towards the improvement of curriculum, pedagogy, and innovations. It has a positive impact on teaching practices and student learning. The PDCA cycle which is stands for Plan Do Check and Action which was defined by Deming. The experts stated that teachers should regularly evaluate their teaching through implementing this cycle and execute at all phases of the teaching and learning process effectively. This confirms the previous study by Hasan and Hossain (2018) that if all teachers and students apply the PDCA cycle, a huge number of innovative and great research projects will be achievable, allowing their universities to obtain a high ranking in worldwide indexes. To enhance professional development teachers should conduct classroom action research, self-planned, and expand more knowledge with academic books and articles

which was commonly known as autonomous learning. They can also learn from works and connect to other schools and teachers in exchanging experiences, observing other teachers teaching to gain experience, discussing and working with the community. School principals should know teachers' competencies and support and provide them the opportunities to get continuous professional development (CPD) through courses and scholarships. King (2018b) stated that teachers must be recognized and understand their capacity development needs and school situations.

To improve competency in professional ethics the experts indicated that teachers should demonstrate a positive role model, ethical behavior, characteristics such as honesty, respect, fairness, patience, and unity. And treat students with kindness, respect without showing any favoritism, partiality, show affection, love, connect to students and create a good relationship with them, and work in the interest of students and the community. This present finding supports a study by Heidari et al. (2015) that being an educator or teacher should possess good qualities such as being modest, patient, generous. They should also communicate and strengthen the relationship with others, treat students, commit to their duty to guide the student to reach the achievement. The experts also emphasized that teachers' roles should fulfill students' needs, aspirations of learners, transparency, justice, demonstrate commitment and responsibility for the teaching profession, and also make a good relationship among teachers and learners. Gurtu (2019) highlighted the obligation towards profession and colleagues that teachers should possess to develop their professionalism such as creating a collaborative culture and respecting the diversity of colleagues and stakeholders, refraining from such criticizing activities, and accepting any extra benefits from students.

Recommendations

Recommendations for Application

1. Professional Knowledge aspect found that the lowest mean was (I have knowledge of foreign languages and technology). So, the teacher should update and broaden knowledge on local, national, and global digital literacy through reading research articles, ongoing professional development by joining short or long training courses, study tours, workshops, etc. School should support them in all things.

2. Professional Practice aspect found that the lowest mean was (I provide feedback to students, parents, or guardians about the progress of students' knowledge, skills, and attitudes). So, teachers should use student assessment and observation to analyze the students' success and challenges, and should also evaluate all aspects of teaching practice regularly to ensure they respond to student needs and interests. School should do (PLC) which allows all teachers to discuss teaching, problems, weakness, and take it to redesign. And keep engagement, communication, and involvement with students, parents and caregivers, and community.

3. Professional Development aspect found that the lowest mean was (I regularly evaluate my teaching and plan for personal professional development). So, the teacher should use the PDCA model for evaluating their teaching and schools should facilitate PLC for improving teaching and programs. The teacher should conduct classroom action research, self-planned, and self-learning, participate in events, short and long-term training via scholarship program to continue professional development.

4. Professional Ethics aspect found that the lowest mean was (I am personally and professionally self-disciplined to enhance the vision of educational, economic, social, and political development). So, teachers should demonstrate a strong or positive role model, ethical behavior, characteristics such as honesty, respect, love fullness, fairness, transparency, patience, unity, and must have disciplined action, and apply leadership skills to those fields as a role model.

Recommendations for teachers and school principals

1. Teachers should try to update their competencies to equip them with local, regional, and global educational contexts through education and research.

2. Teachers should regularly evaluate their actual teaching through implementing (the PDCA model) and try to identify weaknesses and strengths for further improvement and development.

3. Teachers should repertoire of effective teaching strategies and use them to implement well-designed teaching programs and lessons. And skills of effective teaching strategies should practice and try to update new.

4. Teachers should enhance the relationship with students, parents, community, and other stakeholders to improve a better understanding of their students.

5. Teachers should respect the privacy of other teachers, maintain confidentiality, not talk badly of other teachers, or inside the organization.

6. School principals should ensure that they know the current competency of teachers and support and provide them the opportunity to learn and grow through courses and scholarships.

7. School principals should encourage and facilitate the collaborative environment among teachers in school and stakeholders.

8. School principals should facilitate PLC for improving teaching and programs, and give a chance for the teacher to take responsibility for work, open up and share goals with all teachers.

Recommendations for further research

1. For the future researcher should expand the number of participants, school principals and vice-principals should be included, and conduct the research as a region or in the whole country.

2. The researcher should conduct an in-depth study to examine the state of teachers' competencies as classified by the experience, age of teachers, and level of schools.

REFERENCES

REFERENCES

Armstrong, M. (2006). *STRATEGIC HUMAN RESOURCE DEVELOPMENT a guide to action* (3rd edition). The United States of America: Thomson-Shore, Inc.

Ayeni, A. J. (2020). Teachers' Capacity Building And Productivity in Secondary Schools in Ondo North Senatorial District of Ondo State, Nigeria. *Innovative Studies: International Journal (ISIJ),, Volume (3)*(Issue (1)).

BOOKBRIDGE. (2012). *The Education System in Cambodia*. Retrieved from https://www.bookbridge.org/post/the-education-system-in-cambodia

Cascio, W. F. (2019). *managing human resource productivity, quality of work life, profits* (Eleventh Edition). Printed in The United States of America: McGraw-Hill Education.

Cooper, N., & Garner, B. K. (2012). *Developing a Learning Classroom Moving Beyond Management Through Relationships, Relevance, and Rigor*.

Decenzo, D. A., & Robbins, S. P. (1999). *Human Resource Management: Sixth edition*. The United States of America: John Wiley and Sons, Inc.

DeSimone, R. L., & Werner, J. M. (2009). *Human Resource Development* (6th edition). Printed in Canada: Erin Joyner.

Dessler, G. (2006). *a framework for human resource management: fourth edition Gary Dessler* (4th edition). The United States of America: Pearson Prentice Hall.

Dessler, G. (2011). *Human Resource Management* (Twelfth edition). Prentice Hall Pearson Education.

Doumbia, K. (2013). Why is Education So Important in Our Life? Retrieved from https://blog.library.tc.columbia.edu/b/9886-Why-is-Education-So-Important-in-Our-Life

Dy, S. S. (2004). Strategies and Policies for Basic Education in Cambodia: Historical Perspectives. *International Education Journal, 5*(1), 90-97.

Dy, S. S. (2004). Strategies and Policies for Basic Education in

Cambodia: Historical Perspectives. *International Education Journal, Vol 5, No 1, 2004*.

Evans, J. R. (2011). *Quality Management, Organization, and Strategy* (6th edition). Canada: South-Western, Cengage Learning.

Fata, N., & Kreng, H. (2017) *Survey Report on Teachers and Teaching Profession in Cambodia* (146) Retrieved form https://www.academia.edu/41345736/Survey_report_on_teachers_and_teaching_profession_in_Cambodia_2017_

Fei, J. (2018). *MANAGING HUMAN RESOURCE IN THE SHIPPING INDUSTRY* (F. Jiangang Ed. First edition). New York: Routledge.

Gurtu, A. (2019). Professional Ethics in Teacher Education. *TechnoLearn: An International Journal of Educational Technology, 9*(2), 87-89. doi: 10.30954/2231-4105.02.2019.5

Hairon, S. (2020). Back to the future: Professional learning communities in Singapore. *Asia Pacific Journal of Education, 40*(4), 501-515. doi: https://doi.org/10.1080/02188791.2020.1838880

Hanushek, E. A., & Wößmann, L. (2007). *The Role of Education Quality in Economic Growth*: The World Bank.

Hasan, Z., & Hossain, M. (2018). Improvement of effectiveness by applying pdca cycle or kaizen: an experimental study on engineering students. *Journal of Scientific Research, 10*(2), 159-173.

Heidari, M. H., Heshi, K. N., Mottagi, Z., Amini, M., & Shiri, A. S. (2015). Teachers professional ethics from Avicennas perspective. *Educational Research and Reviews, 10*(17), 2460-2468. doi: 10.5897/ERR2015.2400

Igwe, M. O., & Ibara, E. C. (2019). Teachers Capacity Building Skills and Students Learning Outcomes in Junior Public Secondary Schools in Rivers State. *International Journal of Scientific Research in Education, Vol. 12(2)*, 290-305.

King, E. F. (2018a). Developing teacher capacity in Cambodia: an expanded model. *Asian Education and Development Studies, 7*(1), 2-14. doi: 10.1108/AEDS-06-2017-0053

King, E. F. (2018b). Developing teacher capacity in Cambodia: An expanded model. *Asian Education and Development Studies, Vol. 7*(No. 1). doi: https://doi.org/10.1108/AEDS-06-2017-0053

Krejcie, R. V., & Morgan, D. W. (1970). Determining sample size for research activities. *Educational and psychological measurement, 30*(3), 607-610.

Kumar, V., Ali, M., & Kumar, S. (2013). Framework for Implementing Human Resource Development Programmes in Higher Educational Institutions. *international journal of engineering and management science, 4*, 36-39.

Lim, G. S., Mathis, R. L., & Jackson, J. H. (2010). *Human Resource Management An Asia Edition*. Singapore: CENGAGE Learning.

Lussier, R. N., & Hendon, J. R. (2013). *Human Resource Management Functions, Applications, Skill Development*. Printed in canada: SAGE Publications, Inc.

Massing, N., & Schneider, S. L. (2017). Degrees of competency: the relationship between educational qualifications and adult skills across countries. *Large-scale Assessments in Education, 5*(1), 1-34.

McGuire, D. (2014). *Human Resource Development* (2nd edition): SAGE Publications Ltd.

Ministry of Education Youth and Sports, M. (2019) *Continuous Professional Development Framework for Teachers and School Directors* (138) Retrieved form http://www.unesco.org/new/fileadmin/MULTIMEDIA/FIELD/Phnom_Penh/pdf/MoEYS_CPD_Framework_FD06_AJ_140919_en_clean.pdf

MITSDE. (2018). *Processes in Human Resource Management (HRM)*. Retrieved from https://blog.mitsde.com/processes-in-human-resource-management-hrm/

Moe, T. M., & Wiborg, S. (2017). *The Comparative Politics of Education Teachers Unions and Education Systems Around the World*. United Kingdom: Cambridge University Press.

MoEYS. (2018). Education Prosperity Framework by Willms (2018) used for PISA-D Assessment and Analytical Framework.

MoEYS (2019) *Education Strategic Plan 2019-2023* (113) Retrieved form https://www.moeys.gov.kh/index.php/en/policies-and-strategies/3206.html#.YMwW3OFR1PY

MoEYS (2020) *Public Education Statistics & Indicators2019 - 2020* (89) Retrieved form https://www.moeys.gov.kh/index.php/en/stastic-and-indicator/about-statistic-and-indicator.html#.YMwfa-FR1PZ

No, F., & Heng, K. (2017) *Survey Report on Teachers and Teaching Profession in Cambodia* (86) Retrieved form https://www.academia.edu/41345736/ Survey_report_on_teachers_and_teaching_profession_in_Cambodia_2017_

Noe, Hollenbeck, Gerhart, & Wright. (2011). *Fundamentals of Human Resource Management* (fourth edition). New York, Americas: McGrall-Hill Irwin.

Phin, C. (2014). Teacher Competence and Teacher Quality in Cambodia's Educational Context Linked to In-Service Teacher Training: An Examination Based on a Questionnaire Survey. *International Journal of Educational Administration and Policy Studies, 6*(4), 62-69. doi: 2141-6656

Phin, C. (2017). Empirical directions to designing sustainable in-service training framework for primary school teacher in Cambodia. *International Journal of Teaching, Education and Research, 1*(2), 17-38. doi: https://dx.doi.org/10.20319/pijtel.2017.12.1738

Pilanthananond, M. (n.d) *Education Professional Standards in Thailand* (136) Retrieved form https://repository.au.edu/bitstream/handle/6623004553/ 15108/AU-education-review-Abstract-15108.pdf?sequence=6&isAllowed=y

Pov, S., & Kawai, N. (2020). Review of Changes of Education Policy for Development in Cambodia: from the 1860s to the 1980s. *Journal of International Development and Cooperation, 26*(1), 69-78.

Pries, K. H., & Quigley, J. M. (2013). *Total Quality Management for Project Management* The United States of America.

Ramasamy, S. (2009). *Total Quality Management*: Tata McGraw-Hill Publishing Company Limited.

Rany, S., Zain, A. N. M., & Jamil, H. (2012). Cambodia's higher education development in historical perspectives (1863-2012). *International Journal of Learning and Development, 2*(2), 224-241. doi: 10.5296/ijld.v2i2.1670

Raymond A. Noe, John R. Hollenbeck, Barry Gerhart, & Wright, P. M. (2014). *Fundamentals of Human Resource Management fifth edition* (fifth edition). Singapore: McGraw-Hill Education.

RECSAM, S. (2019) *The Southeast Asia Regional Standards for Science Teachers (SEARS-ST) Project* (83) Retrieved form http://www.recsam.edu.my/ index.php/our-resources/project/sears-series

Reddy, S. (2007). *The Icfai University Press on training and Development Perspectives from the Service Sector* (First edition). Printed in india: The Icfai University Press.

Reed, S. M. (2017). *A Guide to the Human Resource Body of Knowledge*. Printed in The United States of America: John Wiley & Sons, Inc., Hoboken, New Jersey.

Révai, N. (2018). *How can teaching standards improve teaching?* Retrieved from https://oecdedutoday.com/how-can-teaching-standards-improve-teaching/

RGC. (2018). *Rectangular Strategy for Growth, Employment, Equity and Efficiency: Building the Foundation Toward Realizing the Cambodia Vision 2050 Phase IV of the Royal Government of Cambodia of the Sixth Legislature of the National Assembly*. Retrieved from http://cnv.org.kh/wp-content/uploads/2012/10/Rectangular-Strategy-Phase-IV-of-the-Royal-Government-of-Cambodia-of-the-Sixth-Legislature-of-the-National-Assembly-2018-2023.pdf.

Rothmann, I., & Cooper, C. L. (2015). *Work and Organizational Psychology* (Second edition). New York, The United States of America: Routledge.

Sadovnik, A. R., & Coughlan, R. W. (2016). *sociology of education a critical reader third edition* (third edition). New York , The United States of America: Routledge.

Sands, L. (2020). *What is Human Resource Development (HRD)?* Retrieved from https://www.breathehr.com/blog/topic/business-process/what-is-human-resource-development-hrd

Shah, M. (2020). *6 Steps for Strategic Human Resource Development*. Retrieved from https://www.techfunnel.com/hr-tech/6-steps-strategic-human-resource-development/

Singapore. (2020). *Our teachers*. Retrieved from https://beta.moe.gov.sg/education-in-SG/our-teachers/

Skhmot, N. (2017). *Using the PDCA Cycle to Support Continuous Improvement (Kaizen)*. Retrieved from https://theleanway.net/the-continuous-improvement-cycle-pdca

Snell, S., & Bohlander, G. (2010). *Principles of Human Resource Management* (M. Acuna Ed. 15th edition). Printed in China.

Sophoan, P. (n.d). *Educational destruction and reconstruction in Cambodia*.

Sothina, K., & Ye, Y. (2015). A comparative study of teachers'job satisfaction of Chea Sim Boeung Keng Kang and Chea Sim Angkor Chey upper secondary schools in Cambodia. *Scholar: Human Sciences, 7*(1).

Susan, H. (2020). *What Is Human Resource Management? Definition & Examples of Human Resource Management?* Retrieved from https://www.thebalancecareers. com/what-is-human-resource-management-1918143

Tan, C., & Tee, N. P. (2012). A critical reflection of teacher professionalism in Cambodia. *Asian Education and Development Studies*.

Tandon, P., & Fukao, T. (2015a). directions in development human development educating the Next generation improving teacher quality in Cambodia. 2. doi: file:///D:/Journal/934390PUB0978100Box385406B00PUBLIC0.pdf

Tandon, P., & Fukao, T. (2015b). *Educating the Next Generation Improving Teacher Quality in Cambodia*.

The Teachers' Council of Thailand. (2005). *Regulation of the Teachers Council of Thailand on Professional Standards and Ethics*. Thailand Retrieved from http://teachercodes.iiep.unesco.org/teachercodes/codes/Asia/Thailand.pdf.

Tyari, P. (2019). *Human Resource Development: Definitions, Needs, Concept*. Retrieved from https://www.papertyari.com/general-awareness/management/human-resource-development/

UNESCO (2011) *Education and Fragility in Cambodia* (94) Retrieved form file:///D:/General%20Education%20System%20in%20Cambodia/Education%20in%20Cambodia.pdfc

Wang, C. M., Mohanan, K. P., & Pan, D. (2002). *Proceedings of the Second Symposium on Teaching and Learning in Higher Education, Singapore, 4-6 September 2002*: Centre for Development of Teaching and Learning (CDTL), National University of Singapore.

Werner, J. M., & DeSimone, R. L. (2006). *Human Resource Development: 4th editiion* (4th edition). The United States of America.

WHO. (1998). *The World Health Report 1998 Life in the 21st century A vision for all*. France World Health Organization.

Wilton, N. (2013). *an introduction to Human Resource Management* (2nd edition). Great Britain: Sage Publications Ltd.

Wisalaporn, S. (2005). *Regulation of the Teachers Council of Thailand on Professional Standards and Ethics* Retrieved from http://teachercodes.iiep.unesco.org/teachercodes/codes/Asia/Thailand.pdf.

APPENDIX

NARESUAN UNIVERSITY
GRADUATE SCHOOL

NARESUAN UNIVERSITY
Graduate School
Phitsanulok, 65000
Thailand

June 8, 2021

Subject: Required data for research collections
RE # ศธ.0603.02/ว 1636

Dear Dr. Kimcheang Hong, Director of Kampong Speu Institute of Technology, Cambodia

Since Mr.Sengkhea Dy, ID number 63060087, the graduate student of the Master of Education Program in Educational Administration of the Graduate School Naresuan University has conducted the thesis title is "The States and Guidelines for Improving Teachers' Competencies in Secondary Schools in Rrey Veng Province, Cambodia". Therefore, I am writing you to ask for your cooperation to allow her to collect the data.

Thank you very much for your great assistance.

Sincerely yours,

(Kanida Narattharaksa, Ph.D.)
Deputy Dean for Academic Affairs
For Dean of Naresuan University Graduate School

ព្រះរាជាណាចក្រកម្ពុជា

ជាតិ សាសនា ព្រះមហាក្សត្រ

ក្រសួងអប់រំ យុវជន និងកីឡា

លេខ:៦៧១១១ អយក. ៩៣

ថ្ងៃ.......... ខែស្រាពណ៍ ឆ្នាំឆ្លូវ ត្រីស័ក ព.ស.២៥៦៥

រាជធានីភ្នំពេញថ្ងៃទី០០ ខែ កញ្ញា ឆ្នាំ២០២១

ជម្រាបជូន

លោកប្រធានមន្ត្រីអប់រំ យុវជន និងកីឡា ខេត្តព្រៃវែង

កម្មវត្ថុ: សំណើសុំអនុញ្ញាតឱ្យលោក **នី សេងយា** ចុះធ្វើការសិក្សាស្រាវជ្រាវប្រមូលទិន្នន័យ សម្រាប់សរសេរនិក្ខេបបទ បញ្ចប់ការសិក្សាពីថ្ងៃទី១០ ខែកញ្ញា ឆ្នាំ២០២១ ដល់ថ្ងៃទី៣១ ខែមីនា ឆ្នាំ២០២២។

យោង: -លិខិតរបស់សាកលវិទ្យាល័យនរេស្សន នៃប្រទេសថៃ ចុះថ្ងៃទី០៨ ខែមិថុនា ឆ្នាំ២០២១។

-ពាក្យស្នើសុំរបស់សាមីជន ចុះថ្ងៃទី២៣ ខែសីហា ឆ្នាំ២០២១។

តបតាមកម្មវត្ថុ និងយោងខាងលើ ខ្ញុំសូមជម្រាប **លោកប្រធាន** ជ្រាបថា៖ លោក **នី សេងយា** ជានិស្សិត អាហារូបករណ៍ថ្នាក់បរិញ្ញាបត្រជាន់ខ្ពស់ ផ្នែករដ្ឋបាលអប់រំ នៃសាកលវិទ្យាល័យនរេស្សន ប្រទេសថៃ បានស្នើសុំ ចុះធ្វើការសិក្សាស្រាវជ្រាវ និងប្រមូលទិន្នន័យនៅតាមវិទ្យាល័យ និងអនុវិទ្យាល័យនានាក្នុងខេត្តព្រៃវែង ចាប់ពី **ថ្ងៃទី១០ ខែកញ្ញា ឆ្នាំ២០២១ ដល់ថ្ងៃទី៣១ ខែមីនា ឆ្នាំ២០២២** ដើម្បីសរសេរនិក្ខេបបទបញ្ចប់ការសិក្សារបស់ ខ្លួនលើប្រធានបទ " The States and Guidelines for Improving Teacher Competencies in Prey Veng Province, Cambodia" ។

អាស្រ័យដូចបានជម្រាបជូនខាងលើ សូម **លោកប្រធាន** អនុញ្ញាតឱ្យលោក **នី សេងយា** បានចុះធ្វើការសិក្សា ស្រាវជ្រាវប្រមូលទិន្នន័យនៅតាមវិទ្យាល័យ និងអនុវិទ្យាល័យនានា ក្នុងខេត្តព្រៃវែង តាមកាលបរិច្ឆេទខាងលើ តាមការគួរ។

សូម **លោកប្រធាន** ទទួលនូវការរាប់អានដ៏ស្មោះពី.......................................

ចម្លងជូន:

-អគ្គនាយកដ្ឋានរដ្ឋបាល និងហិរញ្ញវត្ថុ

-ខុទ្ទកាល័យឯកឧត្តមបណ្ឌិតសភាចារ្យរដ្ឋមន្ត្រី

" ដើម្បីជ្រាបជាព័ត៌មាន"

-កាលប្បវត្តិ-ឯកសារ នាយកដ្ឋាន ទ. វ.ហ.

រដ្ឋមន្ត្រីក្រសួងអប់រំ យុវជន និងកីឡា

បណ្ឌិតសភាចារ្យ **ហង់ជួន ណារ៉ុន**

Announcement

The Graduate School, Naresuan University

Approval of Thesis Proposal to Conduct Research

No. 092/2021

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The Graduate School approved **Mr.Sengkhea Dy,** student ID: **63060087**; Master of Education Program in Educational Administration, to conduct research. The approved thesis proposal entitled: **"THE STATES AND GUIDELINES FOR IMPROVING TEACHERS' COMPETENCIES IN THE SECONDARY SCHOOLS IN RREY VENG PROVINCE, CAMBODIA"** with Associate Professor Dr.Thirasak Uppamaiathichai as the thesis advisor.

Announced date: May 25, 2021

(Professor Dr.Paisarn Muneesawang)

Dean of the Graduate School, Naresuan University

NARESUAN UNIVERSITY

QUESTIONNAIRE

"THE STATES AND GUIDELINES FOR IMPROVING TEACHERS' COMPETENCIES IN SECONDARY SCHOOLS IN PREY VENG PROVINCE, CAMBODIA"

Dear Respondent:

My name is Sengkhea Dy, a student in the Master of Educational Administration at Faculty of Education at Naresuan University, Phitsanulok 65000, Thailand. I am currently doing research entitled "The States and Guidelines for improving Teachers' Competencies in the Secondary Schools in Prey Veng Province, Cambodia".

I hereby request your kind assistance in answering this questionnaire. Rest assured, the information you provide will be treated with confidentiality and used only for this research. Your cooperation in completing this questionnaire will be greatly appreciated.

Part 1: Demographic Information of respondents.

Instruction**:** Please tick (✓) in the box that is true for you.

1. Gender   : ☐ Male   ☐ Female
2. Level of Degree   : ☐ Grade 12 ☐ Bachelor   ☐ Master

Part 2: To study the current state of teachers' competencies in secondary schools in Prey Veng Province, Cambodia.

Instruction: Please tick the 38 questionnaires using a five response Likert scale rating from the highest level (5), high level (4), moderate level (3), low level (2), the lowest level (1) to indicate your level of your current competencies.

Item	Teachers' Competencies	Rating Scales				
		The lowest level	Low level	Moderate level	High level	The highest level
		1	2	3	4	5
I.	**Professional Knowledge**					
1	I know clearly about students' family status involving social and economic backgrounds, disability and ethnicity.					
2	I know the factors and problems that affect students' learning and to deal with it effectively.					
3	I understand well about students' learning needs, capacity, interests, issues, and concerns.					
4	I understand well about students' learning styles and attitudes and how they learn.					
5	I know the educational philosophy, policies, and national education goals.					
6	I am aware of educational assessment, measurement, and evaluation.					
7	I am aware of educational research, innovation and creation, and information technology.					
8	I have knowledge of curriculum content, curriculum development and be able to explain and teach it well.					
9	I understand well about subject matter and be able to explain and teach it well.					
10	I understand well to prepare the lesson plan and implement it effectively.					
11	I have knowledge of connecting content from one subject to another well.					
12	I have knowledge of foreign languages and technology.					
13	I have knowledge of psychology and communication skills.					

Item	Teachers' Competencies	Rating Scales				
		The lowest level	Low level	Moderate level	High level	The highest level
		1	2	3	4	5
14	I can set up and make facilitative activities in the context of learning.					
15	I have knowledge in managing classroom and learning activities.					
II.	**Professional Practice**					
16	I prepare correct and effective teaching curriculum to achieve student learning outcomes.					
17	I prepare correct and effective lesson plans and use appropriate learning materials to achieve student learning outcomes.					
18	I use both formative and summative assessment tools to assess students learning and learning outcomes.					
19	I provide feedback to students, parents, or guardians about the progress of students' knowledge, skills, and attitudes.					
20	I maintain a record of students' participation, their progress and the quality development.					
21	I create a safe learning environment, encourage and help students to increase their responsibilities in learning.					
22	I participate in school development projects to support the learning and welfare of students and colleagues.					
23	I provide opportunities and encourage students to share their innate talents.					
24	I provide students opportunities to learn and overcome challenges as well as critical and creative thinking.					
25	I apply innovative teaching methods and approach to facilitate students' learning and to meet national curriculum standards.					

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Item	Teachers' Competencies	The lowest level 1	Low level 2	Moderate level 3	High level 4	The highest level 5
26	I use the information and communications technology to make teaching and learning more effective.					
27	I build trusting relationships with students to make them involve in teaching and learning.					
28	I set the classroom rules for students to follow which encourage them participate in teaching and learning activities.					
III.	**Professional Development**					
29	I regularly evaluate my own teaching and plan for personal professional development.					
30	I study to develop IT knowledge and skills, and instructional media that can be applied to enhance teaching and learning process.					
31	I seek and read educational articles and research for personal and professional development.					
32	I read research study and article about specialized instructional techniques to improve teaching profession.					
33	I conduct action research to broaden knowledge and improve on teaching and learning.					
34	I uphold positive relationship with students, parents, colleagues, and stakeholders in the community.					
35	I regularly interact with other teachers in practicing academic and professional learning activities for the development of teaching profession.					
36	I regularly collaborate with other teachers to share best practices to improve teaching and learning and drive student achievement.					

Item	Teachers' Competencies	Rating Scales				
		The lowest level	Low level	Moderate level	High level	The highest level
		1	2	3	4	5
37	I regularly participate with other teachers and educators to exchange skills and knowledge to improve teaching and learning activities.					
38	I regularly discuss with administrators and other teachers about student-learning results to identify strategies to help their learning.					
IV.	**Professional Ethics**					
39	I am personally and professionally self-disciplined to enhance the vision of educational, economic, social, and political developments.					
40	I enjoy harmonious relationships with students and the community.					
41	I have commitment, love, faith, honesty, and responsibility to the teaching profession and organizations.					
42	I solve the problems of students, colleagues, and other members of the community with fairness and transparency.					
43	I care students and treat them with love, compassion, concern, help, and support.					
44	I demonstrate as a positive role model for my students physically, verbally, and psychologically.					
45	I provide teaching and services equally and sincerely without requesting or accepting the benefits through the abuse of little and position.					
46	I apply my leadership skills in other fields that involve economic, societal and religious, art and cultural, and environmental development, etc.					

Item	Teachers' Competencies	Rating Scales				
		The lowest level	Low level	Moderate level	High level	The highest level
		1	2	3	4	5
47	I am committed to my role and duty to promote the creation of learning, skills, and good habits to all students without discrimination in any dimension.					

Thank you so much for your cooperation.
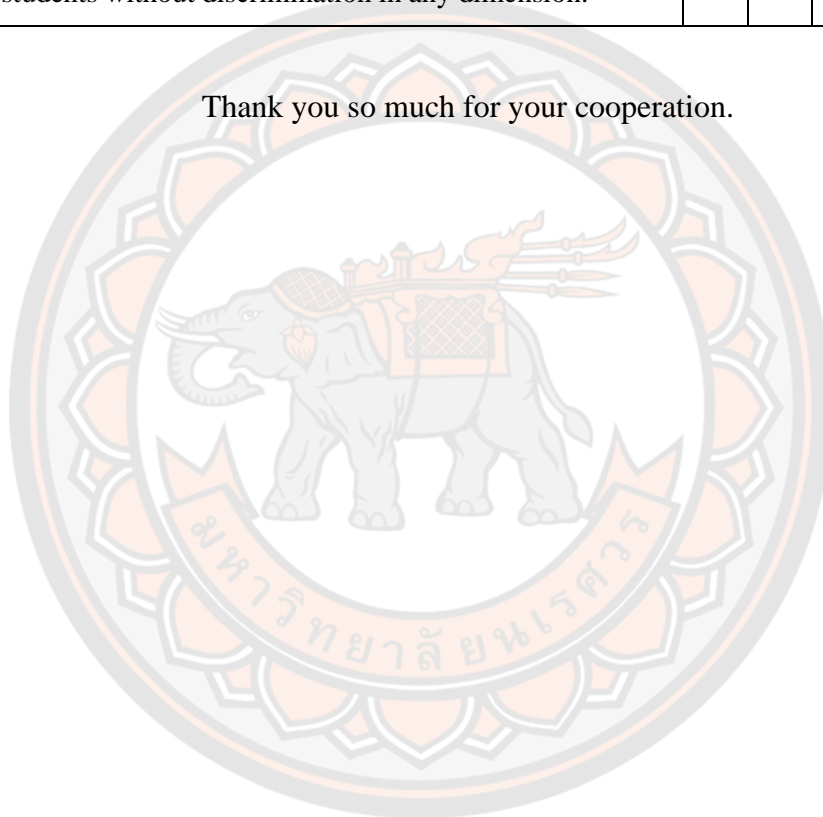
INTERVIEW FORM

Semi-Structured Interview

"The states and guidelines for improving teachers' competencies in secondary schools in Prey Veng Province, Cambodia"

This semi-structured interview is used to respond to the research objective 2 "To study guidelines for improving teachers' competencies in secondary schools in Prey Veng Province, Cambodia"

Researcher: Mr. Sengkhea Dy, master's degree in Educational Administration

Advisor: Associate Professor Dr. Jitima Wannasri, Ph.D.

Interviewee's   name:

…………………………....…………….….………………

Current Position: ………………………………..……………………………………

Current workplace: ……………………………………….…………………….

Interview Date: ……………………………………………….…………..

Start Time: …………………....…… End Time: ………………………...….…

Part 1: Background Information of Interviewee

Please briefly describe your background in the following areas:

Education: ………………………………………………………………….

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Work experience in the education sector: …………………………………….

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Experience from local and oversea training: …………………………………

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Experience as a trainer: …………………………………………………….

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Part 2: To study guidelines for improving teachers' competencies in secondary schools in Prey Veng Province, Cambodia.

1. In your opinion, how to support and improve teachers' competencies in Professional Knowledge?

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2. How can we support and improve teachers' competencies to enhance Professional Practice?

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3. How can we support and improve teachers' competencies to enhance Professional Study?

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4. How can we support and improve teachers' competencies to enhance Professional Ethics?

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Thank You So Much for Your Participation!

Item-Objective Congruence Evaluation Form for Validation of Questionnaire for Teachers' Competencies in Secondary Schools in Prey Veng Province, Cambodia

I have developed the survey tools for teachers' competencies in secondary schools to study the current state of teachers' competencies in secondary schools in Prey Veng province, Cambodia within Teachers Professional Standard which comprises of four dimensions: professional knowledge, professional practice, professional study, and professional ethics.

The survey items ask secondary school teachers to provide their perspectives on the teachers' competencies and the interview items ask experts in the field of administration to provide their perspectives on teachers' competencies. The secondary school teacher rate each of the survey items using a five response Likert scale rating from the highest level (5), high level (4), moderate level (3), low level (2), and the lowest level (1). The experts in the field of administration provide their perspectives on teachers' competencies by answering the interview questions as per their experiences and expertise.

Please rate each of the survey items and interview items using the three-rating scale given below to validate my research questionnaire items on each dimension of teachers' competencies in secondary schools which comprises of professional knowledge, professional practice, professional study, and professional ethics.

Note:

+1: Approved

 0: Not sure

 -1: Not Applicable

The table below shows the Item Objective Congruence Validation form of questionnaire for teachers' competencies in secondary schools to be rated by 3 experts. The IOC will be calculated and then the items which have the IOC of more than ≤ 0.5 will be selected for the survey.

Item	Definition of Dependent Variable (Teachers' Competencies)	Experts' rating				
		Exp 1	Exp 2	Exp 3	Total	IOC
I	**Professional Knowledge**					
1	I know clearly about students' family status involving social and economic backgrounds, disability and ethnicity.	+1	+1	+1	3/3	+1
2	I know the factors and problems that affect students' learning and to deal with it effectively.	+1	+1	+1	3/3	+1
3	I understand well about students' learning needs, capacity, interests, issues, and concerns.	+1	+1	+1	3/3	+1
4	I understand well about students' learning styles and attitudes and how they learn.	+1	+1	+1	3/3	+1
5	I know the educational philosophy, policies, and national education goals.	+1	+1	+1	3/3	+1
6	I am aware of educational assessment, measurement, and evaluation.	+1	+1	+1	3/3	+1
7	I am aware of educational research, innovation and creation, and information technology.	+1	+1	+1	3/3	+1
8	I have knowledge of curriculum content, curriculum development and be able to explain and teach it well.	+1	+1	+1	3/3	+1
9	I understand well about subject matter and be able to explain and teach it well.	+1	+1	+1	3/3	+1
10	I understand well to prepare the lesson plan and implement it effectively.	+1	+1	+1	3/3	+1
11	I have knowledge of connecting content from one subject to another well.	+1	+1	+1	3/3	+1
12	I have knowledge of foreign languages and technology.	+1	+1	+1	3/3	+1

Item	Definition of Dependent Variable (Teachers' Competencies)	Experts' rating				
		Exp 1	Exp 2	Exp 3	Total	IOC
13	I have knowledge of psychology and communication skills.	+1	+1	+1	3/3	+1
14	I can set up and make facilitative activities in the context of learning.	+1	+1	+1	3/3	+1
15	I have knowledge in managing classroom and learning activities.	+1	+1	+1	3/3	+1
II	**Professional Practice**					
16	I prepare correct and effective teaching curriculum to achieve student learning outcomes.	+1	+1	+1	3/3	+1
17	I prepare correct and effective lesson plans and use appropriate learning materials to achieve student learning outcomes.	+1	+1	+1	3/3	+1
18	I use both formative and summative assessment tools to assess students learning and learning outcomes.	+1	+1	+1	3/3	+1
19	I provide feedback to students, parents, or guardians about the progress of students' knowledge, skills, and attitudes.	+1	+1	+1	3/3	+1
20	I maintain a record of students' participation, their progress and the quality development.	+1	+1	+1	3/3	+1
21	I create a safe learning environment, encourage and help students to increase their responsibilities in learning.	+1	+1	+1	3/3	+1
22	I participate in school development projects to support the learning and welfare of students and colleagues.	+1	+1	+1	3/3	+1
23	I provide opportunities and encourage students to share their innate talents.	+1	+1	+1	3/3	+1

Item	Definition of Dependent Variable (Teachers' Competencies)	Experts' rating				
		Exp 1	Exp 2	Exp 3	Total	IOC
24	I provide students opportunities to learn and overcome challenges as well as critical and creative thinking.	+1	+1	+1	3/3	+1
25	I apply innovative teaching methods and approach to facilitate students' learning and to meet national curriculum standards.	+1	+1	+1	3/3	+1
26	I use the information and communications technology to make teaching and learning more effective.	+1	+1	+1	3/3	+1
27	I build trusting relationships with students to make them involve in teaching and learning.	+1	+1	+1	3/3	+1
28	I set the classroom rules for students to follow which encourage them participate in teaching and learning activities.	+1	+1	+1	3/3	+1
III.	Professional Development					
29	I regularly evaluate my own teaching and plan for personal professional development.	+1	+1	+1	3/3	+1
30	I study to develop IT knowledge and skills, and instructional media that can be applied to enhance teaching and learning process.	+1	+1	+1	3/3	+1
31	I seek and read educational articles and research for personal and professional development.	+1	+1	+1	3/3	+1
32	I read research study and article about specialized instructional techniques to improve teaching profession.	+1	+1	+1	3/3	+1

Item	Definition of Dependent Variable (Teachers' Competencies)	Experts' rating				
		Exp 1	Exp 2	Exp 3	Total	IOC
33	I conduct action research to broaden knowledge and improve on teaching and learning.	+1	+1	+1	3/3	+1
34	I uphold positive relationship with students, parents, colleagues, and stakeholders in the community.	+1	+1	+1	3/3	+1
35	I regularly interact with other teachers in practicing academic and professional learning activities for the development of teaching profession.	+1	+1	+1	3/3	+1
36	I regularly collaborate with other teachers to share best practices to improve teaching and learning and drive student achievement.	+1	+1	+1	3/3	+1
37	I regularly participate with other teachers and educators to exchange skills and knowledge to improve teaching and learning activities.	+1	+1	+1	3/3	+1
38	I regularly discuss with administrators and other teachers about student-learning results to identify strategies to help their learning.	+1	+1	+1	3/3	+1
IV.	**Professional Ethics**					
39	I am personally and professionally self-disciplined to enhance the vision of educational, economic, social, and political developments.	+1	+1	+1	3/3	+1
40	I enjoy harmonious relationships with students and the community.	+1	+1	+1	3/3	+1
41	I have commitment, love, faith, honesty, and responsibility to the teaching profession and organizations.	+1	+1	+1	3/3	+1

Item	Definition of Dependent Variable (Teachers' Competencies)	Experts' rating				
		Exp 1	Exp 2	Exp 3	Total	IOC
42	I solve the problems of students, colleagues, and other members of the community with fairness and transparency.	+1	+1	+1	3/3	+1
43	I care students and treat them with love, compassion, concern, help, and support.	+1	+1	+1	3/3	+1
44	I demonstrate as a positive role model for my students physically, verbally, and psychologically.	+1	+1	+1	3/3	+1
45	I provide teaching and services equally and sincerely without requesting or accepting the benefits through the abuse of little and position.	+1	+1	+1	3/3	+1
46	I apply my leadership skills in other fields that involve economic, societal and religious, art and cultural, and environmental development, etc.	+1	+1	+1	3/3	+1
47	I am committed to my role and duty to promote the creation of learning, skills, and good habits to all students without discrimination in any dimension.	+1	+1	+1	3/3	+1

Interview Guide Questions

Teachers' Competencies	Item	Experts' rating				
		Exp 1	Exp 2	Exp 3	Total	IOC
1. Professional Knowledge	How can we support and improve teachers' competencies to enhance professional knowledge?	+1	+1	+1	3/3	+1
2. Professional Practice	How can we support and improve teachers' competencies to enhance professional practice?	+1	+1	+1	3/3	+1
3. Professional Study	How can we support and improve teachers' competencies to enhance professional development?	+1	+1	+1	3/3	+1
4. Professional Ethics	How can we support and improve teachers' competencies to enhance professional ethics?	+1	+1	+1	3/3	+1

BIOGRAPHY

Name-Surname	Sengkhea Dy
Date of Birth	03 February 1995
Address	Kamprov, Pnov 1, Sithorkandal, Prey Veng, Cambodia
Current Workplace	Smaong Lower Secondary School, Prey Veng, Cambodia
Current Position	Lower Secondary School teacher of English and Khmer Language
Work Experience	November 2016 to Present: Lower Secondary School teacher of English and Khmer language at Smaong Lower Secondary School, Prey Veng, Cambodia
Education Background	-November 2014 to August 2016: Certificate of Teacher with Basic Education Degree in English and Khmer from the Regional Teacher Training Center, Prey Veng, Cambodia. - August 2016 to June 2018: Bachelor's Degree of Education in the English for Education from The Chea Sim University of Kamchaymea, Prey Veng Cambodia.