

A MODEL OF TEACHING INTEGRATED THE PHILOSOPHY OF SUFFICIENT ECONOMY TO ENHANCE STUDENTS' CRITICAL THINKING

¹Dr. Jitima Wannasri, ²Dr. Vithaya Jansila, ³Dr. Arphat Tiaotrakul

¹Associate Professor, Faculty of Education, Naresuan University, Phitsanulok (Thailand), jitimaw@nu.ac.th

²Professor, Faculty of Education, Naresuan University, Phitsanulok (Thailand)

³Assistant Professor Dr., Faculty of Education, Naresuan University, Phitsanulok (Thailand)

Abstract

The objective of this research was to develop a model of teaching which integrated the Philosophy of Sufficient Economy to enhance students' critical thinking in the lower northern part of Thailand. The research was divided into three steps: 1) study the state of teachers' learning management which supported students' critical thinking using a questionnaire to survey, 2) document analysis for studying the approach of teaching process which integrated the Philosophy of Sufficient Economy, and 3) formulate a model of teaching integrated the Philosophy of Sufficient Economy to enhance students' critical thinking and verify the model by experts. The tools used were questionnaires for collecting data and means and standard deviation for data analysis. The result found that a model of teaching integrated the Philosophy of Sufficient Economy to enhance students' critical thinking consisted of three components: 1) objective of model, 2) teaching process, and 3) success factors. The model evaluation revealed that the propriety was at high level.

Keywords: Teaching, Critical Thinking, The Philosophy of Sufficient Economy.

I. INTRODUCTION

A changing world, globalization, a changing economy, and technology is a driver of change in schools today. Most of the schools' vision is focused on their students as they leave schools and move on to further education or enter the work world. We want our students to be prepared for their future wellbeing. We know that the life will be very different for our children in the next 10 years and therefore current teaching and learning methods should prepare our students for their lives and jobs. But are today's schools preparing students effectively to study or live well in their future?

Office of Education Council, Thailand (2020) found that learners' competency should be developed in Thai children and youth's basic education to prepare them to live a quality life

in the changing world of 21st century. The core competencies are: 1) language for communication; 2) Mathematics; 3) Scientific inquiry & mind; 4) Life skills & personal growth; 5) Higher order thinking skills & innovations; and 6) Media, information & digital literacy. They are accord with the 21st century skills which are essential to live today and in future. The 21st century students need to be creative and innovative to survive and thrive well. They are also required to be a critical thinker and a problem solver to work and solve problems in today's world and in future. (Schrum & Levin, 2010)

Critical thinking is a higher order thinking skill which refers to the children to be able to use thinking as a tool for learning and living life. Children should be able to analyze simple data

or matters and think of various ways and make decisions based on reason to solve problems. The Office of Education Council (2020) reported that students' higher order thinking skills need to be improved in basic education level. Therefore, this research was conducted to find an approach to prepare and develop students' competency on critical thinking skills for further education and to live in a rapidly changing world. However, critical thinking skills like other skills require motivation and practice, training, and reflection (Egan, 2019).

Dick, Carey & Carey (2014) stated that promoting student development is achieved by making the teaching objectives clear to the students and by incorporating the strategies and techniques in everyday teaching. The teacher can design activities integrated within the lesson with the focus on learning and practicing critical thinking skills to promote efficient learning. Thinking skills can be used as a tool for making decision in the entire life of a student. This research studied to formulate approach of teaching to support students' critical thinking skill.

Research Objective

The objective of this research was to develop a model of learning management which integrated the Philosophy of Sufficient Economy to enhance students' critical thinking.

II. LITERATURE REVIEW

Teaching and Learning

Learning is internal, occurring in the students' mind while carrying out an activity. Teaching is a process to develop students' learning as Hoy & Miskel (2008) stated that learning indicates a change in the individual's knowledge and behavior. Dick, Carey & Carey (2014) stated that general learning components of instructional strategy comprise of five main parts: instructional activities, content presentation, learner participation, assessment, and follow-through activities. According to Orlich et al. (2013) proposed four steps of teaching: lesson design, content to be learned, instructional techniques, and assessment. And

Baker, Ever and Brock (2017) states that the teaching process consists of lesson plan, teaching, and assessment. Therefore, the researcher analyzed the teaching process into three major components that are part of an overall instructional strategy: lesson plan, learning activities, and assessment.

Critical Thinking

Martins (2021) said that critical thinking is the ability to analyze information from a variety of viewpoints, and then identify the best decision of action. Paul and Elder (2006) conclude that it takes many thinking skills to critical thinking: analyzing, assessing, and creating choices. Egan (2019) stated that critical thinking led to develop system thinking,

Martins (2021) proposed the seven-steps critical thinking process which is useful for making decision and the best way of outcome: identify the problem; collect data or information; present the choices of solution; analyze the solutions; and identify the best solution.

Paul & Elder (2006) stated that a well cultivated steps are as follows: raises problems; gathers and assesses relevant information; thinks to create the alternative solutions; assesses the solutions; and communicates the best solution to the problems.

Therefore, the process to cultivate students' critical thinking skill consist of four steps: 1) identify problems, 2) gather information and create ideas for problem solving, 3) analyze and 4) select the best solution.

The Philosophy of Sufficient Economy

Sufficient Economy is philosophy conceived and developed by His Majesty King Bhumibol Adulyadej of Thailand to create a balance and stable development.

Sufficient Economy has three components: 1) Reasonableness refer to the choices that we make are justifiable by academic approach, legal principles, moral or norm, 2) Moderation with reason that are not too much or not too little, is an Eastern concept. Being moderate according to one's means, 3) Self-immunity to

circumstances and environment changes by having good risk management, with two accompanying conditions: knowledge and ethics. Following these components will lead to improve the lives of the Thai people and bring them a genuine and lasting happiness (Ministry of Education, 2011).

Therefore, teaching and learning to develop thinking skill based on Philosophy of Sufficient Economy is to ask questions to stimulate students' thinking by following the three components: moderation, reasonableness, and self-immunity. These components enable students to practice higher order thinking skills to live and solve many problems in future.

III. RESEARCH METHODOLOGY

This research study and development followed the following steps:

Step 1: Studying the state of teachers' learning management which supported students' critical thinking by collecting the data from 50 teachers in five provinces of lower northern region through multi-stage random sampling. Then, studying approaches of learning management to enhance students' critical thinking by means of education and synthesis of document research related to formulating a model of Learning Management to enhance students' critical thinking. The research tool was a questionnaire on a 5-rating scale. Finally, the data was analyzed using mean, standard deviation and content analysis.

Step 2: Formulating a model by drafting a model of Learning Management which integrated the Philosophy of Sufficient Economy to enhance students' critical thinking based on the research result in Step 1. The model was then examined using critiques of 10 experts with experience in learning management or school management. The research tool was a model propriety questionnaire. The data was analyzed using percentage and content analysis, then, a model was improved following the suggestion of the experts.

IV. RESEARCH RESULTS

The research finding was shown as the following:

1. The current state of teaching and learning which supported students' critical thinking was at high level. All the aspects were at high level too.

2. A model of teaching integrated Philosophy of Sufficient Economy to enhance students' critical thinking consisted of 3 components as follows:

2.1) Objectives of a model: to support instruction to improve teaching process, to develop future skills using the three pillars of the Philosophy of Sufficient Economy to enhance critical thinking skill of student.

2.2) A process of teaching had 3 steps: 2.1) lesson plan, 2.2) learning activities, 2.3) assessment

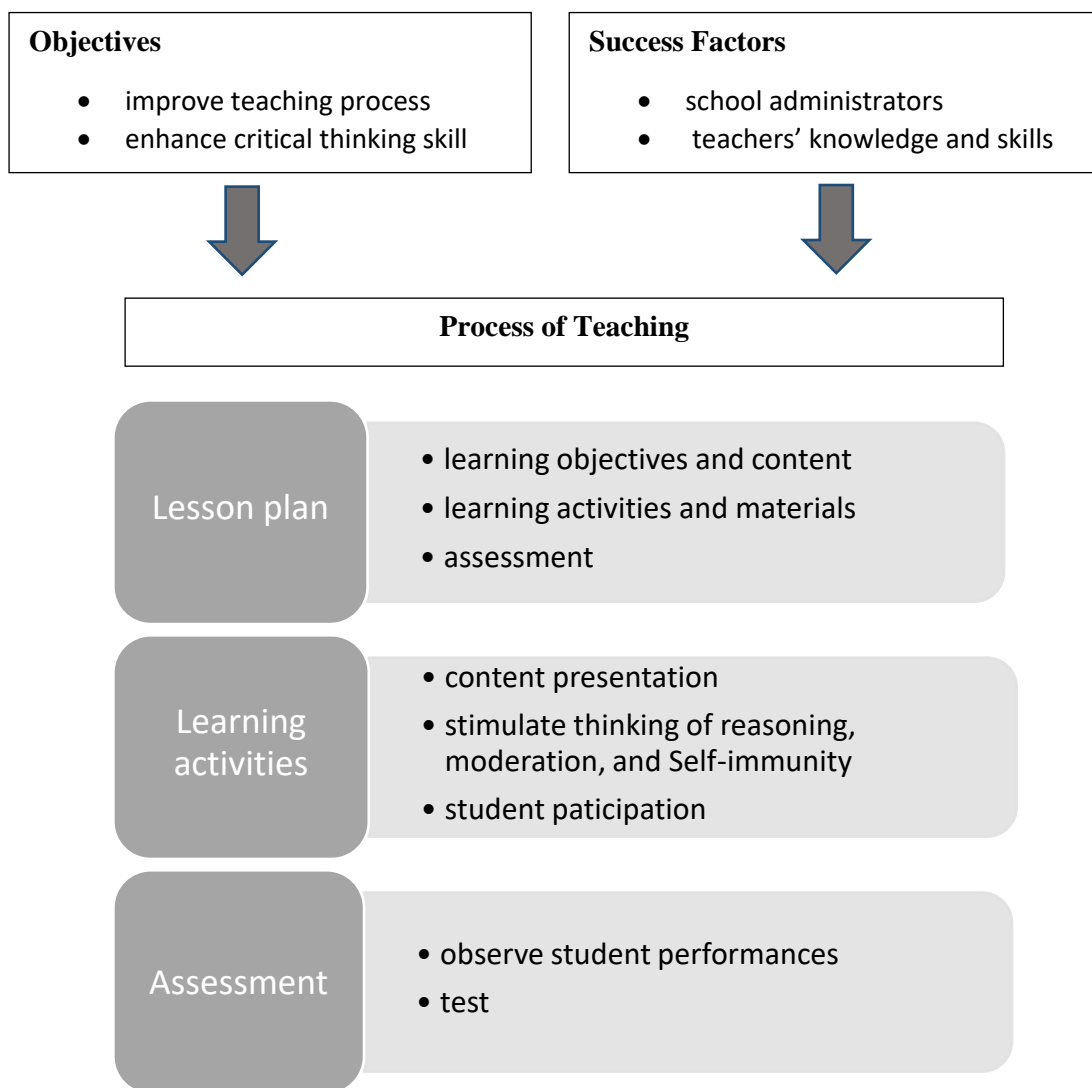
2.2.1) Lesson plan: teacher provides the components of instructional materials and procedures that will be used to enable student mastery of learning outcome. The components of lesson plan were: set learning objectives, determine content to be learned, learning activity which enhances student participation and practices, stimulus materials, and method to assess student performances conforms to learning objectives.

2.2.2) Learning activities: teacher provides students with activities that are directly relevant to the objectives, giving students an opportunity to practice what we want them to be able to do. The activities should begin to motivate students and describe objectives. Then, content presentation needs to be learned using optimal teaching techniques which support students to practice and promote active learning. One of the techniques that has to be used is questioning based on reasonableness, moderation, and self-immunity for practicing critical thinking skill.

2.2.3) Assessment: teacher determine the kind of tools for assessing what students have accomplished. The general aim of assessment is to acquire information to develop student.

There are many methods to evaluate learning outcome, for examples: observe student performances, ask questions during instruction, skills tests, practice tests, posttests, etc. However, all of them should identify criteria of student performance.

3) Success factors: the key factors to reach achievement are strong support of school administrators, teachers' understanding of the pillars of Philosophy of Sufficient Economy to integrate on instruction, and teachers' skills in asking question to stimulate students' thinking.



Picture 1: A model of teaching integrated Philosophy of Sufficient Economy

V. DISCUSSION

The result of the research could be discussed on the following important issues:

The first component of a model is objective of a model. This element is the desired goals that we wish to occur. These objectives are what teachers and students obtain after operating. According to learning theories resource human development, the key element is objectives, and the study of Wannasri (2021) showed that the

model for developing school administrators' leadership in digital era consisted of principles, objectives, the key components, and the evaluation.

The second component is a process of teaching which has 3 steps, 1) lesson plan, 2) learning activities, and 3) assessment. This is the key elements of instruction required for successful learning. Lesson plan describes the procedure and the materials needed in teaching and learning. Learning activities are designed to give students opportunity to participate based

on learning by doing, and assessment presents student performance on what they have accomplished. Conform to Bates (2016) Baker, Ever and Brock (2017) proposed that the teaching process consists of lesson plan, teaching, and assessment. Also, consistent with Wannasri (2020), it was found that learning management for practicing students' thinking skills had three stages: design and plan, learning activities, and assessment.

The last component showed the key success factors of teaching to develop students' critical thinking skill such as strong support of school administrators, teachers' understanding of the pillars of the Philosophy of Sufficient Economy to integrate on instruction, and teachers' skills for asking question in order to stimulate students thinking. School administrators is organization leader who cooperate and facilitate resources to enhance working in school, without his/her support teachers could not reach achievement. Also, teachers are important factor related to develop students in all aspects: knowledge, skills, and attitude. Consistent with a study of Aiyara & Wannari (2021), it was found that input of management model of innovative school were strategy, culture, innovative team, and innovative leader. And also, conform to Wannasri (2021) which stated that one of the key success factors is school administrator who coaches and facilitates teachers for making learning happen everywhere and all time.

VI. CONCLUSION

A model of teaching integrated the Philosophy of Sufficient Economy to enhance students' critical thinking consisted of 3 main components: 1) Objectives of a model: to improve teaching process, and to develop students' thinking skills, 2) A process of teaching consisted of 3 steps: 2.1) lesson plan, 2.2) learning activities, and 2.3) assessment , and 3) Success factors.

Acknowledgement

The researchers would like to thank Thailand Science Research and Innovation for

supporting the research funding to conduct this research project.

Reference

- [1] Bates, B. 2016. Learning Theories Simplified. Los Angeles: SAGE.
- [2] Office of Education Council. (2020). Guidelines for the Development of learners' Competency for learners at the Basic Education Level. Bangkok: Tienwattana Printing.
- [3] Schrum, L. & Levin, B.B. (2010). Leading 21st Century Schools. California: Corwin.
- [4] Martins, J. (2021). How to build your critical thinking skills in 7 steps. Retrieved from <https://asana.com/resources/critical-thinking-skills?>
- [5] Paul, R. and Elder, L. (2006). Critical Thinking: Learn the tools the best thinkers use. New Jersey: Pearson Prentice Hall.
- [6] Egan, A. (2019) Confidence in Critical Thinking. London: Routledge.
- [7] Ministry of Education. (2011). Guidelines for driving Philosophy of Sufficient Economy in schools. Bangkok: Ministry of Education.
- [8] Dick, W. Carey, L & Carey, J. O. (2014). The Systematic Design of Instruction (7th ed.). Harlow: Pearson Education. Baker, T., Ever, G. and Brock, R. 2017. Targeted Teaching. London: SAGE.
- [9] Bates, B. 2016. Learning Theories Simplified. Los Angeles: SAGE.
- [10] Hoy, W. K. & Miskel, C. G. (2008). Educational Administration: Theory, Research, and Practice (8th Ed.). Boston: McGraw-Hill.
- [11] Orlich, D. C., et al. 2013. Teaching Strategies: A Guide to Effective Instruction (10th Ed.). Belmont: Wadsworth.
- [12] Wannasri (2021) The model for developing school administrators' leadership in digital era. Journal of Social Science and Buddhistic Anthropology, 6(10), 458-472
- [13] Aiyara & Wannari (2021). The Management Model of Innovative School for Secondary Schools. Turkish Journal of Physiotherapy and Rehabilitation, 32(3), 19768 -19772