

ผลสัมฤทธิ์ทางการเรียนและความพึงพอใจต่อการเรียนวิชาバスเก็ตบอลโดยใช้การ

จัดการเรียนรู้แบบร่วมมือเทคนิค ที จี ที ของนักศึกษาปี 1

วิทยาลัยฉะจ้วเพื่อการศึกษาปฐมวัย

Learning Achievement and Satisfaction on Learning Basketball

Using the Cooperative Learning with TGT Technique of Year 1 Students

of Chongzuo College for Preschool Education

มิน柱 เจ้า¹ ติดารัตน์ สมานพันธ์²

Mintu Zhao¹ Tidarat Samanpan²

บทคัดย่อ

การวิจัยครั้งนี้มีวัตถุประสงค์ เพื่อ 1) เปรียบเทียบผลสัมฤทธิ์ทางการเรียนวิชาバスเก็ตบอล ก่อนและหลังการเรียนโดยใช้การจัดการเรียนรู้แบบร่วมมือเทคนิค TGT 2) เปรียบเทียบผลสัมฤทธิ์ทางการเรียนวิชาバスเก็ตบอลกับเกณฑ์ร้อยละ 75 3) ศึกษาความพึงพอใจของนักศึกษาที่มีต่อการเรียนวิชาバスเก็ตบอลโดยใช้การจัดการเรียนรู้แบบร่วมมือเทคนิค TGT กลุ่มตัวอย่างคือนักศึกษาชั้นปีที่ 1 จำนวน 30 คน วิทยาลัยฉะจ้วเพื่อการศึกษาปฐมวัย ที่ได้มาโดยการสุ่มแบบกลุ่ม เครื่องมือที่ใช้ในการวิจัยประกอบด้วย 1) แผนการเรียนรู้แบบร่วมมือเทคนิค TGT เรื่องการซูตรลูกบาสเก็ตบอล 2) แบบวัดความสามารถในการซูตรลูกบาสเก็ตบอล มีค่า IOC ระหว่าง 0.60 - 1.00 3) แบบประเมินความพึงพอใจของนักศึกษาที่มีต่อการเรียนวิชาバスเก็ตบอล โดยใช้การจัดการเรียนรู้แบบร่วมมือเทคนิค TGT แบบมาตราส่วนประมาณค่า (Rating scale) 5 ระดับ จำนวน 15 ข้อ มีค่า IOC ระหว่าง 0.60 - 1.00 สถิติที่ใช้ในการวิจัยได้แก่ ร้อยละ ค่าเฉลี่ย ค่าเบี่ยงเบนมาตรฐาน และการทดสอบที่ (t - test).

ผลการวิจัยพบว่า

1. ผลสัมฤทธิ์ทางการเรียนวิชาバスเก็ตบอลหลังการเรียนโดยใช้การจัดการเรียนรู้แบบร่วมมือเทคนิค TGT สูงกว่าก่อนเรียน อย่างมีนัยสำคัญทางสถิติที่ระดับ .01

2. ผลสัมฤทธิ์ทางการเรียนวิชาバスเก็ตบอล หลังการเรียนสูงกว่าเกณฑ์ร้อยละ 75 อย่างมีนัยสำคัญทางสถิติที่ระดับ .01

¹ นักศึกษาระดับปริญญาโท สาขาวิชาหลักสูตรและการเรียนการสอน คณะศึกษาศาสตร์ วิทยาลัยนครราชสีมา

E-Mail: xiaofeng.475769247@qq.com

Master of Education in Curriculum and instruction, Faculty of Education, Nakhonratchasima College.

² อาจารย์ ดร. สาขาวิชาหลักสูตรและการเรียนการสอน คณะศึกษาศาสตร์ วิทยาลัยนครราชสีมา., E-Mail: drtidarat@gmail.com
Lecturer, Faculty of Education, Nakhonratchasima College.

3. นักศึกษาความพึงพอใจต่อการเรียนวิชาバスเก็ตบอลโดยใช้การจัดเรียนรู้แบบร่วมมือเทคนิค TGT ในระดับมากที่สุด ($\bar{X} = 4.53$)

คำสำคัญ : ผลสัมฤทธิ์ทางการเรียน, บาสเก็ตบอล, การจัดการเรียนรู้แบบร่วมมือเทคนิค TGT, ความพึงพอใจ

Abstract

The purposes of this research were to 1) compare the learning achievement on basketball before and after learning using TGT cooperative learning techniques. 2) compare the learning achievement on basketball after learning using TGT cooperative learning techniques with 75% provided criteria. 3) study the students' satisfaction on Basketball using TGT cooperative learning techniques. The sample were 30 students of year 1 of Chongzuo College for preschool education conducted by cluster random sampling. The research instruments were included of 1) lesson plans of Basketball based on TGT cooperative learning techniques. 2) the basketball shooting test, which had the item objective congruence value between 0.60 - 1.00. 3) The satisfaction questionnaire, consisted of 15 items, which had the item objective congruence value between 0.60 - 1.00. The one-group pretest-posttest was the research design. The statistics used for data analysis were mean, percentage, standard deviation, and t-test. The results of the research were as follows;

1. The learning achievement on basketball after learning using TGT cooperative learning techniques was higher than before with statistically significant at .01 level.
2. The learning achievement on basketball after learning using TGT cooperative learning techniques was higher than 75% of the criteria with statistically significant at .01 level.
3. The students were satisfied with the learning using TGT cooperative learning techniques in overall at the highest level ($\bar{X} = 4.53$)

Keywords: Learning Achievement, Basketball, TGT Cooperative Learning Techniques, , Students' Satisfaction

Introduction

Physical education is a part that can develop students' potential, in physical education students will be able to participate in a variety of physical activities, both individual and team sports, both Thai and international, various activities will help learners to achieve results according to their potential growth and physical development has improved health and physical performance to fully develop the mechanism, learn the importance of self-training according to rules, regulations, rules and scientific principles, compete and work together as a team, gain experience from direct self-practice according to aptitude and interest. Physical education focuses on students using activities, movement exercise, games and sports as a tool for overall development both physically, mentally, emotionally, socially and intellectually. Basketball is an international team sport that has been very popular, can be played by both males and females, are often packed to compete in sports at different levels from elementary school to world championships, dribbling basketball transfer basketball shooting is also a skill, movement and basic skills of team play. This will help players to benefit in many ways. However, basketball is a game that requires consistent and accurate skill training. Divide the students into groups and have experts in the group to help guide and practice according to the teacher. Assigned to make students learn and enjoy learning more. Such skills require practice from a young age. In addition to playing basketball Players will have fun and still have value for players. There is physical, mental, emotional and social development, especially the development of mechanical skills. and nervous system and it also helps to strengthen relationships.

Cooperative Learning is a model of learning management. One way of learning management that focuses on learners as the center of importance and can also make higher achievements It is an activity that focuses on group processes. The activities are divided into 5 steps as follows: preparation stage, teaching stage, group activity stage Performance review stage, summary stage, and group performance evaluation (Chaiwat Suthirat, 2015) Cooperative learning is a learning activity that allows students to build a good relationship between members Because everyone cooperates in the work of the group, all members are involved and have the opportunity to think, speak, express their opinions. act equally smart kids help children who are not good at studying, make

smart kids proud know how to spend time As for children who are not good at it, they will appreciate their kindness in members together and promote social skills (Chanpen Chuapanich and Soison Sakulrak, 1999). This is in line with Adams and Hamm (Adams and Hamm, 1990) who say that cooperative learning is a learning management model that combines a good mix of teaching methods. It's a model for schools. to be able to convince students to have fun Enthusiasm for working in groups together by the teacher who promote learning and thinking skills by organizing learning for learners to use their abilities together the whole group to develop solutions quick thinking and cooperation in comment to encourage students to have more self-esteem which Tissana Khamanee (2005) also said that conventional learning management tends to ignore the relationships and interactions between learners. Most of us tend to focus on the interaction between the teacher and the learner or between the learner and the lesson. The relationship between students is a dimension that is often ignored or overlooked in spite of the effect of research clear that Learners' feelings towards themselves, their schools, teachers, and classmates have a great effect on learning in cooperative learning has developed a management style Learn by using the method of grouping various patterns. as a guideline for organizing learning activities, a model of collaborative learning management with the learning of the Slavin group (Slavin) is widely accepted. There are 5 techniques as follows: 1. Student Team – Achievement Division (STAD) 2. Team - Games Tournament: TGT 3. Team - Assisted Individualization (TAI) 4. Learning, reading and Writing (Cooperative Integrated Reading and Composition: CIRC) and 5. JIGSAW, respectively (Thitiphan Kodchakon, 2011).

From the problems mentioned above and the studied of cooperative learning, the researcher was interested in TGT cooperative learning techniques (Team-Game Tournament) because TGT cooperative learning techniques is consistent with nature, physical education subjects encourage learners to see self-worth. It is an important part in the success of working as a team. They have studied and developed themselves from the sources of knowledge that they have. For example, using games as a learning medium criterion test Let's work together to develop a plan for the ability of self and team towards goals. There is also competition with learners of the same ability, which learning management can stimulate interest, create challenges and encourage learners to be more interested in learning management. the effect of on basketball learning

achievement of the students. As these reasons and benefits, I was interested to use TGT cooperative learning techniques to improve the students' skills on shooting basketball.

The research objectives

1. To compare the ability of basketball shooting before and after learning using TGT cooperative learning techniques.
2. To compare the ability of basketball shooting after learning using TGT cooperative learning techniques with 75% of the criteria.
3. To study the students' satisfaction on Basketball using TGT cooperative learning techniques.

Benefits of the study

1. Teachers apply it to improve basketball shooting skills with other sports such as share ball, netball, etc.
2. Basketball players or those who are interested in using TGT cooperative learning techniques to improve basketball shooting skills.

Scope of research

1. Population and sample

Population used in the research were 2 classes, 60 students of Chongzuo College for Preschool Education.

The sample was conducted by class, 30 students of Chongzuo College Preschool Education using cluster random sampling.

2. Content scope

The content used in this research was about practicing basketball shooting skills.

Table 1 Learning activities content

No	Learning activities content	Hour
1.	Overview of basketball	3
2.	Basketball sports competition rules and the referee	3
3.	Basketball skills, tactics and teaching method	3
4.	The mouth of the door with one hand above and both hands at chest level.	3
5.	basketball goal jump	3
6.	A shot under the hoop	3
Total		18

3. Variables

Independent Variable: learning Basketball using TGT cooperative learning techniques.

Dependent Variable: learning achievement and students' satisfaction on Basketball using TGT cooperative learning techniques.

Terminology definition

1. Learning Basketball using TGT cooperative learning techniques means the learning activities on Basketball to improve an ability of basketball shooting by using TGT cooperative learning techniques which consisted of 5 learning steps; 1) Preparation steps 2) Team arrangement 3) Group activities 4) Competition step 5) Lesson summary and group work assessment

2. Learning achievement is the result of learning Basketball on shooting basketball which was measured on the ability of basketball shooting arising from the Teams Games Tournaments (TGT) techniques which was adjusted by the scores of the basketball shooting test based on Basketball Goal Quality Criteria refers to the criteria used to classify the quality of goals scored of short shot into the basket as follows:

Basketball goal quality criteria in the hoop within 30 seconds

15	balls or more	very good
10 – 14	balls	good

5 – 9	balls	fair / enough
0 – 4	balls	improve

3. Students' satisfaction means feel of like or love to learn and play and also the opinion on Basketball that arising from learning by using TGT cooperative learning techniques, measured by the satisfaction questionnaires which is the 5 items of 5 rating scales evaluation, as follows:

Level 5	means satisfaction at the highest level.
Level 4	means satisfaction at high level
Level 3	means satisfaction at moderate level.
Level 2	means satisfaction at low level.
Level 1	means satisfaction at the least level.

Research design

The researchers used an experimental design One - Group Pretest - Posttest Design follows (Cambell And Used Stanley, 1969) are shown in Table 3.1

Table 1 Experimental Schemes

group	Pre-test	Treatment	Post-test
experimental group	T_1	X	T_2

Symbols Used in Experimental Schemes

T_1 Pre-test

X Refers to the use of TGT cooperative learning techniques

T_2 Posttest

Research instruments

The instruments used for collecting data on this research included of :

1. lesson plans of Basketball based on TGT cooperative learning techniques.
2. The basketball shooting test, which had the item objective congruence value between 0.60 - 1.00.
3. The satisfaction questionnaire, consisted of 15 items, which had the item

objective congruence value between 0.60 - 1.00.

The results

The results of the research were as follows;

1. The ability of basketball shooting after learning using TGT cooperative learning techniques was higher than before with statistically significant at .01 level.
2. The ability of basketball shooting after learning using TGT cooperative learning techniques was higher than 75% of the criteria with statistically significant at .01 level.
3. The students were satisfied with the learning using TGT cooperative learning techniques in overall at the highest level ($\bar{x} = 4.53$)

Table 2: Comparison of basketball shooting ability between before and after learning using TGT cooperative learning techniques of year 1 students of Chongzuo College for Preschool Education

test score	n	\bar{x}	S.D.	df	t
Pre-test	30	2.93	2.45	29	21.21**
Post-test	30	13.16	1.74		

** Statistically significant at the .01 level, t (0.01 ;29) = 21.21

From Table 2, it showed that the average scores of basketball shooting ability in post-test of year 1 students by using TGT cooperative learning techniques was higher than pre-test, where an average scores of pre-test was 2.93 and post-test score was 13.16 when the difference was analyzed using t-test, it indicated that it was differ statistically significant at the .01 level.

Table 3: Comparison of basketball shooting ability between after learning using TGT cooperative learning techniques and 75% criteria of year 1 students of Chongzuo College for Preschool Education

test score	n	full score	threshold score	\bar{x}	S.D.	(%)	t
post-test	30	15	12.00	13.16	1.74	80.00	21.21**

** Statistically significant at the .01 level, $t (0.01 ;29) = 21.21$

From Table 3, it showed that the average scores of basketball shooting ability in post-test of year 1 students by using TGT cooperative learning techniques was higher than threshold scores, where an average scores of threshold was 12.00 and post-test score was 13.16 when the difference was analyzed using t-test, it indicated that it was differ statistically significant at the .01 level.

Table 4: Students' satisfaction on Basketball using TGT cooperative learning techniques of year 1 students of Chongzuo College for Preschool Education

article No.	List	satisfaction		
		level	Interpret	
		\bar{x}	S.D.	
1	You are familiar with the TGT cooperative learning techniques	4.50	0.50	high
2	You think TGT cooperative learning techniques lessened your learning anxiety	4.50	0.56	high
3	Are you looking forward to starting (or continuing) TGT cooperative learning techniques	4.50	0.50	high
4	You think using TGT cooperative learning techniques teaching can help learners to master more knowledge in Basketball	4.50	0.56	high

article No.	List	satisfaction		Interpret
		level \bar{x}	S.D.	
5	You think the TGT cooperative learning techniques help increase the frequency of skills and performances on Basketball	4.57	0.62	the highest
6	You think the TGT cooperative learning techniques helps to improve learners' ability to shoot the balls more precisely	4.53	0.62	the highest
7	You think the TGT cooperative learning techniques can improve learners' skills of shooting a ball in a basket	4.60	0.55	the highest
8	You think TGT cooperative learning techniques is helpful for Physical education skills	4.50	0.56	high
9	You think TGT cooperative learning techniques can improve learners' autonomous learning ability	4.53	0.56	the highest
10	You think TGT cooperative learning techniques can improve your self-control	4.60	0.66	the highest
11	You find the TGT cooperative learning techniques classroom more engaging	4.57	0.67	the highest
12	You think the TGT cooperative learning techniques activities are more conducive to learning	4.47	0.56	high
13	In your opinion, TGT cooperative learning techniques is more suitable for students' learning situation and more suitable for basketball	4.47	0.72	high
14	You are satisfied with the teaching design, professional knowledge and organization of	4.50	0.62	high

article No.	List	satisfaction	
		level	Interpret
		\bar{x}	S.D.
activities of TGT cooperative learning techniques			
15	If you continue teaching TGT cooperative learning techniques, you will continue to be actively involved in learning	4.60	0.55
Total		4.53	0.59
the highest			

From Table 4, it showed that students were very satisfied with learning Basketball using TGT cooperative learning techniques in all aspects. The mean was 4.53 and standard deviation was 0.59, which was at the highest level of satisfaction.

Discuss the results

The study was indicated that :

1. The learning achievement on Basketball after using TGT cooperative learning techniques was higher than before with statistically significant at the level of .01 and was higher than 75% criteria, this is because the management of learning by let the students have enough time to practice and be able to improve their basketball skills, which is consistent with Charoen Krathuanrat (2005) who said that Training consistency is paramount to develop oneself to be a step towards success and athletes who train regularly with heavy loads that is appropriate for their own physical condition will be able to express their abilities or as successful as a group of talented athletes, they lack consistent and consistent training. It is also consistent with the research of Wayu Kanchanasorn and others (2016) who have studied the effect of collaborative learning management on the skills of playing takraw with the inner foot and satisfaction of Physical Education Students Faculty of Education, Khon Kaen University, the objectives were to 1) study the effect of cooperative learning management on the skills of playing sepaktakraw with the inner foot. Otherwise the group processes are focused on the learners to build their own skills, repeat practices, solve problems and individual differences and focusing on the learners repetition of practicing which corresponds to

Thawat Weerasiriwat (1995) who said that improving skills are depended on practicing. Practice leads to learning and learning comes from action.

2. The student satisfaction after learning using TGT cooperative learning techniques in overall was at the highest level ($\bar{X} = 4.53$, S.D.=0.59), this is because the process of organizing learning activities that were applied from Slavin & Slavin. (1995) with the stage of learning management. There is teaching practice by teachers explaining the skills and performances. There is a group of assorted abilities and TGT technique cooperative learning together with a series of activities on learning. Group members help each other. Students get excited by the competition. Fun learning with a set of competition. In accordance with Wanwilai Phakdeeruk (2019) who studied the effect of cooperative learning by TEAM-GAME-TOURNAMENT (TGT) and TEAM-ASSISTED INDIVIDUALIZATION in Volleyball for secondary Grade 1, the studied was indicated that

In addition, the students reflected that learning by using TGT cooperative learning techniques helps to develop skills faster, develop a way of thinking, learn with fun and understanding because it is a communication between friends. The TGT cooperative learning techniques was organized learning management with the competitive game group activities by dividing the students into groups of different abilities, students have the opportunity to practice, exchange, learn, help each other in every step. The students dare to express themselves, dare to think, dare to act, and have good interactions with each other. In particular, the competitive game technique (TGT) does not focus on testing, but focuses on developing sports skills through competitive game activities, this helps encourage learners to be happy and have fun, all group members must meet the criteria which is consistent with Kanchana Arun Sukrujee (2003). Discussing the benefits and value of cooperative learning management will help develop learners' learning, enabling learners to learn how to seek knowledge on their own, help create a good learning atmosphere for students.

Recommend

1. Teachers should combine various factors of students and make reasonable groups as far as possible.

2. Set appropriate learning tasks. In this link, teachers should try their best to combine students' learning level to set learning tasks with similar difficulty.
3. Improve students' monitoring ability. Teachers should improve students' self-monitoring ability in this process to ensure the efficiency of classroom learning.
4. The evaluation methods should be diversified. Teacher evaluation content should be made according to the specific situation of the corresponding evaluation, evaluation should be objective, concrete.

Reference

- Adams, D.N. & Hamm, M.E. (1990). **Cooperative learning-critical thinking and collaboration across the curriculum.** Springfield, il: Charles Thomas.
- Boonchom Srisaat. (2002). **Preliminary research.** 7th printing, Bangkok: Suwiriyasasana
- Chaiwat Suthirat. (2015). **80 innovations in learning management that focuses on learners.** 6th printing Bangkok: Danex Inter Corporation.
- Chanpen Chuapanich. (1999). **Scientific Concepts: Fundamental Processes in Research.** Thai Wattanapanich: Bangkok.
- Kanchana Arun Sukrujee. (2003). **Satisfaction of cooperative members towards cooperative operations.** Chaiprakarn Agriculture Co., Ltd. Chaiprakarn District, Chiang Mai Province. Graduate School, Agricultural Extension, Graduate School, Chiang Mai University.
- Slavin, R. E. (1995). **Cooperative learning: Theory, research, and practice.** Boston: Allyn & Bacon.
- Soison Sakonrak.(2017). **Collection of articles on teaching and research at the secondary school level.** Bangkok: Publishing House of Chulalongkorn University. 69-83.
- Tawat Weerasiriwat. (1994). **Sports Medicine.** Bangkok: Odeon Store.
- Thitana Khammanee. (2005). **Pedagogical Sciences.** 4th edition, Bangkok Dan Suttha Printing Co., Ltd.

Thitiphan Kodchakon. (2011). **A study of achievement in social studies.** And responsibilities of Mathayomsuksa 1 students who received collaborative learning management by using TGT technique and relational group learning management. Secondary Education Srinakharinwirot University

Wanwilai Phakdeeruk.(2019). **Eeffect of cooperative learning by TEAM-GAME-TOURNAMENT (TGT) and TEAM-ASSISTED INDIVIDUALIZATION in Volleyball for secondary Grade 1.** Thesis in Master of Education of Graduate School of Srinakharinwirot University.