



## The Effect of Estafet Games on the Motor Skills Children Age 5-6 Year in Aba Karangmalang Kindergarten

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**Abstract:** The research aims to see the effect of the relay games on rough motor skills of the child, which include throwing and catching, walking on a boardwalk, and jumping on two legs. The research used in this research is quantitative research with research method is pre experimental with One Group Pretest-Posttest Design approach. The subjects of this study were all students of group B in ABA Karangmalang kindergarten, Yogyakarta, as many as 2 classes taken by purposive sampling. Research with data analysis is done statistically using Paired T test. The result of this research is that the relay game has a significant influence on the gross motor of the child proved by Paired T test analaisis with sig value (2-tailed = 0.001)  $< \frac{1}{2} \alpha$  (0,025).

**Keyword :** Estafet Games, Gross Motor Skills

### Introduction

In principle education is interpreted as a conscious and awkward effort to develop human potential. Ahmadi (2003: 70), said that education is an activity that consciously and deliberately and responsibly carried out by adults so that the intraction arises between the two so that the child reaches the desired and continuous dreams. Education is one component that has a role in growing and developing individual potential. More simply, education can be understood as a necessary process to gain balance and excellence in human development. Education takes place since humans are in the womb until the end of human life.

Referring to the UU Sisdiknas Number 20 Year 2003 on Education of Early Childhood Education Article 1 paragraph 1, stated that "early childhood education, hereinafter referred to as early childhood education (PAUD), is a coaching that is shown to children from birth to age six years through provision of educational stimuli to assist physical and spiritual growth and

development in order for the child to be prepared for further education".

Sensitivity is the time when maturation of physiological and psychic functions is ready to perceive stimuli from the environment. In accordance with the terms Piere Duquet (Jasni Herlani, 2008: 23), "*a child who does not draw is an anomaly, and particulary so in the years between 6 an 0, which is outstandingly the golden age of creative expression*" ranges of age of birth to six years, children begin to be sensitive to receive berbgai efforts to develop the potential of children.

Accordingly, education teaching in PAUD aims to help lay the groundwork for the development of knowledge, skills, creativity and prepare children to enter basic education by developing religious (moral), physical, motor, cognitive, social, and artistic values.

Often the motor development of preschoolers is neglected. This is because the parents do not understand, supervisor, or teachers themselves that motor development becomes a very important and inseparable part in the lives of young children. In general, children in



kindergarten do not have good motor skills. The development of gross motor skills plays an important role in maintaining stability and coordinating good movement. Need to be trained in well-managed, well-directed and well-planned games according to the stage of child development in the learning process (Abdussalam, 2009: 23-27).

Motoric is a set of Traffic to use and control the body, both coarse motion and fine motion. In preschoolers, rough motor skills develop in line with fine motor skills (Papalia and Feldman 2004). Motor skills manifest through adaptation process. Individuals try to adjust to the adaptation process by gaining some new experiences. A preschooler tries to hold a big ball. Changes will occur when the child learns that the ball is bigger than the toys they normally play during the adaptation process (Samsudin, 2005).

According to these experts can be concluded that the game has a certain effect on motor development of preschoolers. Playing is a very fun activity and favored by children at an early age. Stimulation of gross motor skills obtained through play, active play is an activity that involves physical activity. These are some ways for children to learn about their bodies and how they build control over their environment (Kutrtz, 2008: 15). In the planning movement required some motion patterns and actions associated with gross motor as the child climbs onto the bench and jump (woodifeld, 2004: 45).

Thus the relay game is an alternative in the development of rough motor skills of children. In this case, the relay game to be performed is to throw and catch the ball, walk on the boardwalk, and jump on two legs. Accordingly, Morisson (2008: 221), reveals that movement plays an important role in the development of motion and skills that include activities such as moving the body, walking, running, jumping, dancing, rolling,

climbing and so on. Rough motor movement is the movement of limbs roughly or hard. Movement and control are part of rough motor skills, usually these developments increase according to the child's age in physical growth and physical play. Through physical play, early childhood motor skills develop at a rapid rate (Paulene H. Kamps, 1996: 24-25).

### Research Method

This research is quantitative. The research method is pre experimental with One Group Pretest-Posttest Design approach. The purpose of this study is to prove the influence of the game relay on the abusive motor skills of preschoolers in Kindergarten ABA Karangmalang.

Participants are all students of group B in TK ABA Karangmalang, Yogyakarta, as many as 2 classes and meet the qualifications, conducted by using purposive sampling. The research instrument used an observation of gross motor skills, initially providing intervention in the form of a relay game using a game of walking on a boardwalk, jumping with both feet, and the last step is to throw the ball with the right target to all respondents. Data were analyzed by using Paired T test to see the difference between pretest and rough motor postes of children. The analysis is done by comparing the condition of pre and post experiment.

### Results

The result of analaisis game relay poured in three game activities that is: throw and catch the ball, walking on the boardwalk, and jump on two legs. To see the normality of pretest and posttest data using Kolmogorov-Smirnov Test. The goal is to know whether the distribution of data is normally

distributed. The results of the normality test can be seen as following:

**Table 1. Normality Test  
One-Sample Kolmogorov-Smirnov Test**

		pretest	posttest
N		30	30
Normal Parameters <sup>a,b</sup>	Mean	5.3667	7.0000
	Std. Deviation	1.54213	1.50860
Most Extreme Differences	Absolute	.146	.146
	Positive	.146	.146
	Negative	-.126	-.146
Test Statistic		.146	.146
Asymp. Sig. (2-tailed)		.105 <sup>c</sup>	.100 <sup>c</sup>

Based on table 1, from the results of normality test using One-Sample Kolmogorov-Smirnov Test showed that the value of pretest significance of  $0.105 > 0.05$  then the data pretes normal distribution and significance value for postes that is  $0.100 > 0.05$  it can be concluded that the data is distributed normal.

**Table 3. T-test  
Paired Samples Test**

	Paired Differences					t	df	Sig. (2-tailed)
	Mean	Std. Deviation	Std. Error Mean	95% Confidence Interval of the Difference				
				Lower	Upper			
Pair 1 pretest - postes	-1,63333	2,32651	,42476	-2,50207	-,76460	-3,845	29	,001

Based on table 3, it is found that the value of sig. (2-tailed = 0.001)  $< \frac{1}{2} \alpha$  (0,025) then from the results there is a difference between pretest and postes after the relay. In other words there is a relay game influence on rough motor skills.

To see the homogeneity of data that is using levene test test. This homogeneity test is done to see whether or not the variance of two or more distributions is equal. The results of the homogeneity test can be seen in the table:

**Table 2. Homogeneity Test**

**Test of Homogeneity of Variances**

Motorik\_kasar

Levene Statistic	df1	df2	Sig.
.002	1	58	.967

From hogenitas test results obtained significance value of 0.967 then this data is normally distributed.

After doing normality test and homogeneity test then dilakikannya test the difference between pretest and postes to see the difference of rough motor skills before and after the game of the relay. To test the difference between the pretes and postes of the relay game using the Paired T test. The results of the paried test can be seen as follows:

## Discussion

The results of processing and testing data, that in table 3 shows the existence of rough motor differences before and after the game of the relay that is in the form of throwing and catching,



walking on the board of the catwalk, and jumping with two feet, there is a significant increase in motor abilities of children. Thus, the ability to sharpen the child correctly will give good results of motor development.

Rough motor skills involve large body muscles that allow functions such as maintaining balance, walking, jumping, climbing, pushing, pulling, and ball skills. Proper play activities are the key to giving stimulating children to help their motor development.

According to Hurlock (1978) motor development means the development of physical movement control through nerve activities, nerves, and muscles are coordinated. The movement involves large limbs used for walking, jumping, running, tiptoe, swimming and so on.

In line with this Maimunah Hasan (2009: 95) reveals that the rough motor is the largest area of development in the age of the toddler, which begins with walking, running, jumping, then throw.

Rough motives include:

- 1) Climbing rope, ladder, climbing
- 2) Running
- 3) Kick the ball
- 4) Throw the ball
- 5) Revealing the ball
- 6) Throw bolabmain jump rope
- 7) Walking on a boardwalk. (Selamet Suyanto, 2005: 192).

The results of this study indicate that the perubhan and improvement of gross motor skills began to develop to develop as expected. Can be said that the game has a positive influence on the development of children in various dimensions that is cognitive, effective, social, and physical. As explained by Jess Claussen (2012: 54) that when children play outside ruanagan, the possibility of children's opportunities can be

stimulated in decision makers, problem solving, and creative thinking because the outdoor is more varied and less structured from a closed room. But it is also a constraint usually less outside the room if menstimulus about children's rough mototrik movement.

The approach of learning through the game will have a good effect on the improvement of reacting ability, eye and foot coordination, and the dexterity and awareness of the body balance that must be taken into account thoroughly (Payne and Issacs, 2008).

### Conclusion

The results show that the relay games are in the form of throwing and scooping, walking on a boardwalk, and jumping on two legs, a significant increase in gross motor abilities of children. The results of this study indicate that the perubhan and improvement of gross motor skills began to develop to develop as expected. Can be said that the game has a positive influence on the development of children in various dimensions that is cognitive, effective, social, and physical.

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