

THE INFLUENCE OF MEDIA FACILITIES ON PLAYING GEOMETRIC ON EARLY CHILDHOOD NUMERACY SKILLS

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Abstract

The goal of this study was to determine the impact of Geometry Play Media on early childhood. The experimental group and the control group are used in this investigation. This is a quantitative research strategy using an Experimental Design and a Nonequivalent Control Group Design. The population in this study was 30 children of TK ABA 31 Semarang; the samples in class A were 15 children, and the samples in class B were 15 children. This research will use a saturated sampling technique. Saturated sampling is done if there are too few members of the population. Therefore, all members of the population are used as research samples. Techniques for gathering data include observation, documentation, and unstructured tests. The normality test, homogeneity test, and hypothesis test were employed in this study's data analysis methodologies. According to the independent sample t-test calculation, the significance value of the control class pre-test is $0.001 < 0.05$, and the value of the experimental class pre-test is $0.001 < 0.05$. The significance value of the control class post-test is $0.000 < 0.05$, and the value of the experimental class post-test is $0.000 < 0.05$. As a result, the conclusion of the research conducted by researchers using H_0 is rejected, whereas H_a is approved, indicating that the geometry media has a substantial influence on the numeracy skills of TK ABA 31 students in Semarang.

Keywords

Calculating Ability, Early childhood, Media Play Geometry, TK ABA 31 Semarang



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INTRODUCTION

Early childhood education is critical. Early childhood is characterized by rapid growth and development, both physically and psychologically. The youngster can quickly absorb all that happens in his environment at a young age. This time is known as the golden age or golden age since children have a lot of motor nerve development and cells in their brains, which allows the child's brain to absorb knowledge very well (Latief, 2020). Early childhood can develop numerous facets of this education, including cognitive, religious, moral, physical-motor, language, social, emotional, and aesthetic development. If one or more components are highly developed, the child will be able to cultivate the hidden abilities and potentials in them well. However, it would be preferable if all areas could develop properly and in a balanced manner. The ability to count the beginning of the child is one component of development that is the focus of research (Fitriana & Windiarti, 2020).

When children start school, they already have huge individual disparities in their numerical performance. There are three possible explanations for this. First, there are general cognitive variables, such as IQ and working memory ability (Benavides-Varela et al., 2016). Because the child's absorption of information is generally high between the ages of 4-6 years, it is preferable to teach basic abilities and the creation of behavior, particularly to introduce mathematics, at this age. Numeracy abilities are significant at the age of five since they aid in the development of other skills (Rohmah & Waluyo, 2014). Counting objects, time, place, distance, and speed while shopping is a mathematical function. Length, weight, and volume measurements are all mathematical functions. One of the fundamental abilities that children must develop is the capacity to count from the beginning. The capacity to count from the beginning is taught from a young age. It is hoped that children will be able to process their learning, find a variety of alternative problem-solving methods, develop mathematical logic skills, knowledge of space and time, the ability to sort and group and prepare for the development of the ability to think carefully (Handayani, 2019).

Because the child's absorption of information is generally high between the ages of 4-6 years, it is preferable to teach basic abilities and the creation of behavior, particularly to introduce mathematics, at this age. Numeracy abilities are significant at the age of five since they aid in the development of other skills (Rohmah & Waluyo, 2014). Mathematics is the ability to think logically in order to solve issues (Koswara, 2013). The ability of a growing child to understand and make relational statements (for example, learning what it means for a number to be equal to, more than,

or less than another number), that is, the ability to compare, classify, and understand one-to-one correspondence and seriation (Aunio & Niemivirta, 2010), is central to the development of Mathematical Thinking. Counting, geometry, measuring, seriation, number operations, patterns, categorizing, and pictures are all mathematical ideas that must be presented in early life. It is difficult to introduce seriation or sorting in youngsters aged 4-5 years (Juniati & Hazizah, 2020). It will be simpler to understand if children are given the opportunity to experience themselves or utilize tangible items when being introduced because, at this stage, children learn to use symbols and cannot reason rationally.

Mathematics can help young children study independently so that they can divide their time wisely and handle their own pocket money well. Furthermore, teaching youngsters mathematics can help them think and reason, allowing their brains to develop and allow them to solve difficulties (Annisa, 2022). Learning mathematics, on the other hand, can teach children the fundamentals of counting so that later, children will be better prepared to follow the learning of Mathematics at a more complicated level of education (Maryam, 2019).

It is critical in this scenario to provide stimulation, encouragement, and support. Teachers must be able to improve arithmetic learning, particularly the capacity to count, in accordance with their inventiveness, beginning in school. The scientists discovered a variety of issues with children's counting skills based on preliminary observations. There are multiple youngsters in Class A at ABA 31 Semarang Kindergarten. Following the counting, learning exercises have not developed. The author observes a teacher distributing worksheets to his students, and the teacher demonstrates how to do so. When the children worked on the worksheets supplied by the teacher, they were not excited, and some of them refused to work because they were bored.

Based on the observations made above, the author believes that there are several issues that cause children to be unable to count. These issues include teachers' inability to construct mathematical learning activities in the area of counting, teachers' lack of understanding of their students' requirements, children's inability to focus on following the learning process, and less interesting learning.

Because media play helps develop children's creativity, we must persuade the government to establish media play facilities in Early Childhood Education (Muninggar, 2019). Parents and educators can impart instructional elements in learning through games. Early childhood children are delighted and joyful as a result of the game (Fitriana & Windiarti, 2020). Conditions in Indonesia

revealed that the government has supported the initiative to improve children's creativity through teacher guidance (Latief, 2020). The government should encourage media play in Early Childhood Education in order to improve teacher quality through training and the availability of media play in Early Childhood. Geometry is the most popular early childhood media (Dewi, 2019). The media is a medium for learning about geometric shapes and sizes in order to develop the fundamentals of learning to count. Furthermore, it aids children in the recognition of forms, colors, sizes, patterns, and numbers. As a result, the author employs a variety of media play geometry to build the ability to count children.

In Semarang, the availability of media is uneven. As in some sections of Semarang, particularly in distant locations, there is still a lack of media play and inadequate infrastructure. In reality, playing media is critical to delivering the learning in addition to playing Geometry media, which can be a media play in imparting mathematical learning about the concept of geometry, numbers, or numbers and simple addition. The role of teachers in providing learning through developing playing media contained in institutions can also be very significant for ongoing learning so that children can study with excitement and enthusiasm without compulsion so that children can accept and understand learning.

According to the author's interview with a kindergarten teacher, teachers continue to apply the previous curriculum in their classrooms. The learning model employed is still classical, and the media used for the child's learning process is less complete, so the technique of presenting the material, particularly mathematical learning in children, is not conveyed to the maximum. Lack of maximal delivery of learning since the teacher does not use media to play. Teachers are increasingly utilizing children's worksheets and whiteboards. As a result, the writers attempt to develop children's counting abilities through the means of playing Geometry.

Other observations reported by the writers at TK ABA 31 Semarang revealed that most children's arithmetic competence is still low. Some children are still confused and unable to mention geometric shapes (when teachers draw geometric shapes, children are still confused and incorrectly mention geometric shapes), some children are still incorrect in recognizing colors, and children are also unable to recognize the concept of numbers (when the teacher writes on a number board, some children are still incorrect in answering these numbers). During breaks, the majority of them prefer to play outside rather than indoors with blocks and other playing media. This might happen because instructors' learning methods are less accurate, the media used is less attractive, teachers lack

creativity in delivering learning, and students are less motivated and enthusiastic about paying attention to what teachers express. One method for improving math learning in kindergarten students at ABA 31 Semarang is to use Geometry-related media.

Other research related to this study is the *first* research conducted by Kholidah (2019), who talked about *"Meningkatkan Kemampuan Berhitung Melalui Media Dadu Geometri Pada Anak Kelompok A."* This research is a type of experimental, qualitative research that focuses on determining the effect of geometric dice on children's counting ability. The results of this study Media playing dice geometry can improve numeracy in children Group A TK Mentari Harapan Blimbing Paciran Lamongan school year 2017/2018, and this is evident from the results of pre-survey research with class completeness reached 59.2%, in the first cycle of class completeness 72% and in the second cycle of class completeness reached 88.4%. In addition, research conducted by Safitri & Yaswinda (2023), who talks about *"Pengaruh Media Labirin Geometri Untuk Meningkatkan Kemampuan Matematika Permulaan Anak Usia 4-5 Tahun Di Taman Kanak-Kanak"*. This study uses a model of experimental quantitative research that wants to know the influence of the media geometry maze as a medium for improving children's math skills. The results of this study are known from the hypothesis test. The Independent sample t-test Sig (2 - 2-tailed) value of 0.012 is smaller than 0.05, thus concluding there is a significant difference between the average score of experimental and control classes. So, there is an influence of geometry maze media to improve the beginning math skills of children aged 4-5 years in Kartika kindergarten 1-63 Padang. The research conducted by Sari (2021) talks about *"Pengembangan Media Permainan Puzzle Geometri Dalam Mengembangkan Kemampuan Kognitif Anak Usia Dini."* This research manifold research *Research and Development (R&D)* develops Learning Media geometry puzzle games as a medium to develop children's cognitive skills. The results of this study are the development of children's play media in the form of puzzle games that are different from other studies. Then, research conducted by Susilowati et al. (2019), who talked about *"Pengembangan Dadu Hitung Edukatif Sebagai Media Untuk Menstimulasi Kemampuan Berhitung Anak Usia Dini"* This study uses the method *Research and Development (R&D)*. The results of this study are educational Dice Media count declared feasible to stimulate the ability to count in early childhood. The results of product trials were declared feasible with a percentage value of 86.66%, and the results of usage trials were declared feasible with a percentage value of 90%. The research conducted by Lestari et al. (2023), who talks about *"Pengaruh Permainan Dakon Geometri Terhadap Kecerdasan Logika Matematika Anak Usia 5-6 Tahun Di KB Handayani, Pujananting, Kab. Barru "* the

results of this study obtained an average increase in the experimental group of 13.5 while in the control group of 11.5, and the test results show the value of sig. (2-tailed) $0.028 < 0.05$, then H_0 is rejected, and H_1 is accepted. So, the Dakon geometry game has a significant influence on the mathematical logic intelligence of children aged 5-6 years in KB Handayani, Pujananting, Barru District.

Based on the previous research, the fundamental difference of this study is that this study focuses on the influence of the variables of geometry playing media in general on the ability to count children. Meanwhile, other research focuses on geometric variables, specifically such as Dakon geometry, dice geometry, maze geometry, and so forth. This study is important to determine the effect of the variables of playing Geometry on the ability to count children

Based on this background, the researchers wanted to know how the influence of media playing Geometry on the ability to count early childhood. This study is based on the fact that no one has touched on the cognitive aspects by discussing the ability to count, so this study is important because it examines the impact of media facilities to play geometry on the ability to count in early childhood.

METHOD

Sugiyono (2015) describes a research technique as a scientific way of collecting data with specific goals and objectives. This study uses a quantitative approach with the type of experiment. Quantitative research methods are ways to obtain knowledge or solve problems encountered and carried out and carried out carefully and systematically, and the data is collected in the form of a series or collection of numbers Nasehudin (2015). In this study, the data collection technique to be used is observation. This technique is done with a deep observation accompanied by records of the object under study (Arikunto, 2010). Data collection using instruments related to playing media geometry and early childhood numeracy. Here is the grid of instruments used in data collection.

Table 1. The Instruments

No	Variable	Aspect	Item
1.	Media Playing Geometry	Visual skills	<ol style="list-style-type: none"> 1. Children are able to recognize symbols by shape 2. Classifying objects by color
		Verbal skills	<ol style="list-style-type: none"> 1. The child is able to name simple symbol shapes 2. The child is able to name and stick emblems and symbols in accordance with the lesson.
		Drawing skills	<ol style="list-style-type: none"> 1. The child can draw geometric shapes 2. The child can draw what is instructed
		Logical skills	<ol style="list-style-type: none"> 1. Compare the difference in shape. 2. Able to work under pressure
2.	Early Childhood Numeracy	Degree of Mastery of The Concept	<ol style="list-style-type: none"> a. Able to connect between objects with symbols that are numbers b. The child can sort from small to large or large to small size
		Stages of The Transition Period	<ol style="list-style-type: none"> 1. Children begin to read numbers 2. The child can write the numbers mentioned
		Emblem Recognition Stage	<ol style="list-style-type: none"> 1. Child can count numbers 1-10 2. Children can learn the shapes of numbers

Source: Early Childhood Development Achievement Level Standard (STPPA) 2022

The design used in this experimental research is a *Nonequivalent Control Group*. This design is a comparison test between pre-test and post-test between two groups, where the selection of groups is chosen randomly. The first step is to start the test (*pre-test* (i.e., the act or action) *treatment*) using media play geometry, then close with a final Test (*post-test*) (Abraham & Supriyati, 2022).

The total population in this study was 30 children consisting of 2 classes, namely Class A and Class B. Sampling method using *nonprobability sampling*. The method of *probability sampling*, that is, sampling, does not give the same opportunities. Then, based on the sampling method, researchers will use saturated sampling techniques. Saturated Sampling is done if there are too few members of the population. Therefore, all members of the population sampled research (Sahir, 2021). This is due to the population consisting of 30 children.

This study was conducted in kindergarten ABA 31 Semarang with 15 children in Class A in the experimental group and 15 children in Class B as the control group. The design that will be done in the research is that the experimental group will play with a puzzle box, where the puzzle box has a flat shape and is equipped with numbers. The information on the numbers is supplemented by Addition and subtraction. In the experiment, the researcher will explain each part in the box to be placed in the part that corresponds to the addition or subtraction of numbers. Here, the child will be given *treatment* in the form of interaction with the puzzle box in accordance with the information related to The Shape of the figure and the corresponding figure.

The results of the data obtained will be conducted first on the validity test and reliability test. Validity is an indicator that describes the degree of accuracy and correctness of a measuring instrument. Instruments that have high reliability and truth are referred to as valid or valid instruments. However, instruments with an unfavorable degree of validity show a low level of reliability (Pakpahan et al., 2022). Then, a reliability test will be carried out before analyzing the data. A reliability test is a test used to determine the level of confidence an instrument or data collection tool can be relied upon properly. Reliability indicates the extent to which the instrument is consistent in measuring the variables studied (Arikunto, 2010).

Then, this study carried out the process of data analysis by performing a normality test, homogeneity test, and hypothesis test. *First*, a normality test is used in regression models to evaluate whether a disruptive variable has a distribution that follows a normal pattern. This study will be tested using the method *One Sample Kolmogorov-Smirnov* with a significance level of 0.05. If the significance value obtained from the test exceeds 0.05, it can be concluded that the data show a normal distribution tendency (Sahir, 2021). *Second*, the homogeneity test is used to determine whether the data of each factor is homogeneous or not. This study will use the test *levene test* as a data testing technique. Basic decision-making that can be seen from the significance value > 0.05 . If the significance test value is above 0.05, then the data can be said to be homogeneous (Pakpahan et al., 2022). *Third*, hypothesis testing using independent sample t-test. Independent sample t-test is a parametric test used to determine the difference in mean between two groups (experimental group and control group) significantly.

Then, the researcher determines the hypothesis to guess the answer to the results of the study. The hypothesis is a temporary answer by researchers whose truth still needs to be tested and proven so that from the study of pre-existing theories, researchers can make a temporary answer.

The answer is that while that will be done testing (Lolang, 2014). The hypotheses in this study are as follows:

Ho: There is no effect of geometry play media on early childhood numeracy

Ha: There is an influence of geometry playing media on the ability to count in early childhood.

FINDINGS AND DISCUSSION

Findings

Based on the results of this study, researchers conducted a study of 8 meetings, with four meetings in the experimental group and four meetings in the control group. The sample used as many as 30 children: 15 children in the experimental group and 15 children in the control group in kindergarten ABA 31 Semarang. Before starting the study, the researcher first asked the institution for permission to carry out research at the institution. The first and second meetings of the researchers conducted observations of children with assessment indicators that have been made by researchers. Then, in the next two meetings, researchers conducted data collection in the control group. Furthermore, in the next two meetings, researchers conducted experiments and retrieval of data on the experimental group. The prerequisite test conducted before the statistical test is as follows:

1. Normality Test

A normality test is a test carried out with the aim of assessing the distribution of data on a group of data or variables, whether the distribution of data is normally distributed or not. The normality test is useful to determine the data that has been collected, normally distributed, or taken from the normal population (Fahmeyzan et al., 2018). The Data used to perform this normality test is the data obtained from the pre-test and post-test of control and experimental classes. The results of the normality test using SPSS version 22 at the significance level of 5% ($\alpha=0.05$). Decision-making is that if the value of significance > 0.05 , then the data is significant or normally distributed data, but if the value of significance < 0.05 , then the data is not significant or normally distributed data (Pramono et al., 2021). This can be seen from the table below:

Table 2. Normality Test Results

		One-Sample Kolmogorov-Smirnov Test			
		Experimental class pre-test Data	Experimental class post-test Data	Control Class Pre-Test Data	Post-test Data of control class
N		15	15	15	15
Normal Parameters ^{a, b}	Mean	23.80	28.87	21.20	21.47
	Std. Deviation	1.521	2.416	2.210	2.232
Most Extreme Differences	Absolute	.185	.189	.197	.205
	Positive	.148	.122	.141	.144
	Negative	-.185	-.189	-.197	-.205
Test Statistic		.185	.189	.197	.205
Asymp. Sig. (2-tailed)		.178 ^c	.157 ^c	.120 ^c	.089 ^c
a. Test distribution is Normal.					
b. Calculated from data.					
c. Lilliefors Significance Correction.					

From the table above, it can be seen that the experimental pre-test significance value of 0.178 > 0.05 can be interpreted as significant experimental pre-test data so that it can be interpreted as normal distribution data. It is also known that the experimental post-test value of 0.157 > 0.05 can be interpreted as significant experimental class post-test value so that it can be interpreted as normal distribution data. Then, it is known that the value of the control class pre-test significance of 0.120 > 0.05 can be interpreted as the value of the control class pre-test is significant so that it can be interpreted as normally distributed data. Then, the significance value of the control class post-test is 0.089 > 0.05, so it can be said that the value of the control class post-test is significant. Based on the normality test data, it can be seen that all variables are significant, so it can be interpreted that all variables have a normal distribution. Thus, the prerequisite test can proceed to the homogeneity test as follows:

2. Homogeneity Test

A homogeneity test is a statistical test procedure that aims to show that two or more groups of data samples are taken from a population that has the same variance (Sianturi, 2022). After the normality test and the results are normally distributed, the homogeneity test is performed to see whether the samples from both groups are in identical conditions or can be said to have the same understanding. Homogeneity Test decision-making can be seen from the significance value > 0.05.

If the significance test value is above 0.05, then the data can be said to be homogeneous (Setyorini, 2022). Homogeneity test in this study can be seen in the following table:

Table 3. Pre-test Homogeneity Test Results

Test of Homogeneity of Variances			
Pre-test			
Levene Statistic	df1	df2	Sig.
2.448	1	28	.129

Based on the table above, it can be seen that the significance value is $0.129 > 0.05$, so it can be said that the results of the pre-test of the experimental class and the control class are homogeneous. Then, the next table will describe the results of the post-test homogeneity test with the following results:

Table 4. Post-Test Homogeneity Test Results

Test of Homogeneity of Variances			
Post-test			
Levene Statistic	df1	df2	Sig.
.065	1	28	.800

Based on the table above, it can be seen that the significance value of $0.800 > 0.05$, so it can be said that the results of the post-test experimental class and control class are homogeneous.

Furthermore, the test results set prerequisites have been met, so it can be continued by testing the hypothesis as follows:

3. Hypothesis Test

Hypothesis testing is a process carried out in order to make decisions from two opposing hypotheses (Purwanto & Suharyadi, 2011). After the data is declared normal and homogeneous, to answer the hypothesis that has been formulated and to answer it in the formulation of existing problems, the results of observations of understanding geometry will be analyzed using an independent sample t-test to find the influence of geometric media on the ability to count children, while the hypothesis formulated is as follows:

Ho: There is no effect of geometry play media on early childhood numeracy

Ha: There is an influence of geometry playing media on the ability to count in early childhood.

The basic decision-making of the hypothesis test is if the value is significant > 0.05 , then H_0 is accepted, or H_a is rejected (the difference is not significant). If the value is significant < 0.05 , then H_0 is rejected, or H_a is accepted (significant difference). The results of the hypothesis test can be seen in the table below:

Table 5. Hypothesis Test Results

		Independent Samples Test								
		Levene's Test for Equality of Variances		t-test for Equality of Means		Sig. (2- tailed)		Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference
		F	Sig.	t	Df					Lower Upper
Pre-Test	Control Class	2,448	,129	3,753	28	,001	2,60000	,69282		1,18082 4,01918
	Experimental Class			3,753	24,833					
Post-test	Control Class	,065	,800	8,713	28	,000	7,40000	,84928		5,66034 9,13966
	Experimental Class			8,713	27,825					

Based on the hypothesis test above, it can be seen that the significance value of the control class pre-test is $0.001 < 0.05$, and the experimental class pre-test is $0.001 < 0.05$, so it can be said that H_0 is rejected and H_a is accepted. Then, the test results of post-test data are known that the significance value of the post-test Control class is $0.000 < 0.05$ and the post-test experimental class is $0.000 < 0.05$, so it can be said that H_0 is rejected and H_a is accepted. Thus, there is a significant difference between the average score of the experimental class and the control class. So it can be concluded that there is an influence between the media playing Geometry on the ability to count in early childhood.

Discussion

The study was conducted by giving geometry media to the experimental group. Geometric Media is used in the form of a square on each side of which there is a puzzle. The first side of the puzzle has flat shapes such as squares, rectangles, triangles, and circles. The next side of the puzzle is in the form of numbers, addition, and subtraction, and the other side of the puzzle is in the form of circles, triangles, and squares sorted from smallest to largest or vice versa.

To optimize the learning process of children in the ability to count by using puzzles, researchers focus more on numbers, shapes, and sizes. Researchers focus on using numbers from 0 to 9 so that children can understand and recognize these numbers. In addition to introducing basic numbers, researchers also teach simple addition and subtraction, as researchers do in treatment in experimental classes.

For the second treatment, researchers used a flat shape on the other side of the puzzle. The flat shapes used are square, rectangle, triangle, and circle. This is done so that children understand and recognize the shape of a flat shape, as done by researchers in the treatment in the experimental class by teaching children to assemble puzzle pieces into a flat shape of a square, rectangle, triangle, or circle.

The third treatment of researchers used the size of the learning on the other side of the puzzle, namely by sorting the shape from the smallest to the largest. This is done so that children can understand small, medium, and large sizes. Before being given treatment, children still do not understand the size of the shapes on the puzzle.

The conclusion of the three treatments conducted by researchers in the experimental class is that children who, before being given treatment, did not understand the concept of numbers, shapes, and sizes, then after being given treatment there was an increase in the ability to recognize numbers, shapes, and sizes in children.

The results of statistical analysis between the experimental group and the control group showed that there is an influence between the media play geometry on the ability to count early childhood in kindergarten ABA 31 Semarang, where children in the experimental group experienced an increase in the ability to count mathematics compared to the control group.

Geometry play Media used in learning activities in kindergarten ABA 31 Semarang can optimize the ability to count children. The development of Learning media is necessary in order to optimize the quality of learning. One of them is the ability of teachers to choose the right Learning

media. This development activity is mainly related to the process of making media that is carried out systematically, starting from the conception/design stage, media production, and evaluation (Muninggar, 2019). These steps must be completed according to the procedure so that the media produced meets the expected quality. The growth and development of the child grows and develops very rapidly. This is in line with Stppa Permendikbud RI number 137 of 2014 on early childhood, children aged 5-6 years mentioned that at that age, children should be able to think logically in recognizing the shape, color, and size, classify objects into groups of the same or similar, and sort objects by size. So, at this age, especially 5-6 years old, children can already recognize, classify, and understand geometry.

Playing Geometry Media can develop problem-solving skills in elementary school students. Media play geometry is one of the stimulation that can be given to children, which helps children grow. Namely, children can train eye coordination, hand, and logic, exercise patience, and provide knowledge, and the maze game is one of the games that can help children distinguish shapes and colors. Media play geometry has great benefits to optimize the development of children, including a) *learning by planning* a game that can develop gross motor and fine motor skills that are very influential on the psychological development of children; b) developing the right brain. Through the game, the work function of the right brain can be optimized because games with peers often cause joy; c) develop children's socialization and emotional patterns; d) learn to understand the value of giving and receiving as a place to practice realizing a sense and attitude of confidence, trusting others, and the ability to negotiate and solve problems (Juniati & Hazizah, 2020).

In addition, research conducted by Safitri & Yaswinda (2023), who talks about "*Pengaruh Media Labirin Geometri Untuk Meningkatkan Kemampuan Matematika Permulaan Anak Usia 4-5 Tahun Di Taman Kanak-Kanak*". This study uses a model of experimental quantitative research that wants to know the influence of the media geometry maze as a medium for improving children's math skills. The results of this study are known from the hypothesis test Independent sample t-test Sig (2 - 2-tailed) value of 0.012 is smaller than 0.05, thus concluding there is a significant difference between the average score of experimental and control classes. So, there is an influence of geometry maze media to improve the beginning math skills of children aged 4-5 years in Kartika kindergarten 1-63 Padang.

CONCLUSION

Based on the results of the study, it can be concluded that there is an influence of media playing Geometry on the ability to count early childhood. This is based on the results of hypothesis testing with a pre-test significance value of a control Class of $0.001 < 0.05$ and a pre-test experimental class of $0.001 < 0.05$, so it can be said that H_0 is rejected and H_a is accepted. Then, the test results of post-test data show the significance of the post-test control class of $0.000 < 0.05$ and the post-test experimental class of $0.000 < 0.05$, so it can be said that H_0 rejected and H_a accepted. Thus, there is a significant difference between the average score of the experimental class and the control class. So it can be concluded that there is an influence between the media playing Geometry on the ability to count in early childhood.

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