

## ARTICLE

# The Effect of Microsoft Power Point Media Utilization on Student Learning Outcomes on Theme 3 Healthy Food Grade 5 SDN 29 Gunung Sarik

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### Abstract

The problem found in the field is the low learning outcomes of students at SDN 29 Gunung Sarik. Because the learning process is still conventional which only uses printed textbooks as a learning medium and the lecture method as a learning method. The teacher also admitted that he had not used media in the learning process in class. The formulation of the problem in this study is whether there is a difference in the average score between class 5A as an experimental class and class 5B as a control class and whether there is a significant effect in the use of Microsoft Power Point media on student learning outcomes in Theme 3 Healthy Food class 5 SDN 29 Gunung Sariak. This study aims to determine whether there is a difference in the average score between class 5A as an experimental class and class 5B as a control class and see whether there is a significant effect in the use of Microsoft Power Point media on student learning outcomes in Theme 3 Healthy Food class 5 SDN 29 Gunung Sariak.

This type of research is quasi-experimental research. It consists of 2 classes, namely the experimental class and the control class. The experimental class is class 5A using Microsoft Power Point media treatment and the control class is class 5B being treated using printed textbook media. The sample used is Total Sampling, in which the number of samples is equal to the total population, namely 42 students. This research was conducted on Theme 3 healthy food. To test the hypothesis, this study uses the t statistical test, with a significant level of  $\alpha$  0.05.

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## 1. Introduction

Learning according to Law no. 20 of 2003 concerning the National Education System Chapter I article 1 paragraph 20 states that "learning is the process of interaction of students with educators and learning resources in a learning environment". Learning as a learning process built by the teacher to develop creative thinking that can develop students' creative thinking, and can increase the ability to construct new knowledge as an effort to improve good mastery of subjects. The current technological era tends to increase student interest when educators apply learning methods that use technology-based media. For elementary school students, the media is a new thing that is more interesting, giving rise to a higher sense of curiosity. This also has an impact on students' interest in learning the material in the learning media that has been provided so that it affects student learning outcomes. According to Rusman (2013: 169), "Media is a message delivery from the sender to the recipient of the message, thus the media is a vehicle for channeling learning information or channeling messages"

Based on interviews and observations that have been conducted at SDN 29 Gunung Sarik, it is known that student learning outcomes are still low, this is evidenced by the results of interviews conducted with grade 5 teachers at SDN 29 Gunung Sarik. The results of the interviews obtained, the teacher said that the learning process at SDN 29 Gunung Sarik was still conventional, using only printed textbooks as the learning medium and the lecture method as the learning method. The teacher also admitted that he had not used media in the learning process in class. According to the observations of researchers, it can be seen that the learning process in class is less effective because when the teacher is explaining in front of the class the focus of the students is to pay attention to the teacher's explanation only at the beginning of 5-10 minutes after that students choose to do other activities such as scribbling on the back of a book or talking to a friend next door which made the classroom noisy.

The results of research conducted by Saputro (2018) entitled "The Influence of the Use of Power Point Media on the Thematic Learning Outcomes of Class IV Students at SDN 1 Surabaya Bandar Lampung" can be concluded that in this research there is a significant difference and influence in the application of Power Point media, namely by 58% of integrated thematic learning outcomes for fourth grade students at SD Negeri 1 Surabaya in the 2017/2018 academic year.

The application of Microsoft Power Point media can be used as learning media by optimizing existing features and adapting the material to be delivered such as animation, audio, video, and images, which makes the appearance of learning more varied. Microsoft Power Point is equipped with animations that not only apply to text but also to images, lines, videos, and so on. It is hoped that Microsoft Power Point can describe and present subject matter that can attract students' interest. Therefore, it is from this background that the authors are interested in researching the effect of using Microsoft Power Point learning media with the title Effects of Using Microsoft Power Point Learning Media on Student Learning Outcomes in Theme 3 Healthy Food Class 5 SDN 29 Gunung Sariak.

## 2. Experimental

This type of research is quasi-experimental research. Arikunto (2005: 207) states that experimental research is research that is intended to determine whether there is an effect of something imposed on the investigated subject. The trick is to compare the experimental class and the control class. The population of this study were all 5th graders of SDN 29 Gunung Sarik who were enrolled in Semester 1 of the 2022/2023 Academic Year. Sampling was done by using Total Sampling technique. In accordance with the problems to be studied, the sample in this study consisted of two classes, namely the experimental class and the control class. Class 5A was determined as the experimental class and class 5B as the control class.

In this study using a research instrument in the form of test questions used in this study, namely questions in the form of multiple choice (multiple choice) of 25 questions related to the indicators specified in the lesson plan. The research procedure was carried out in three stages. The first stage includes: Establishing a research schedule and preparing a research letter; Determine the sample class, namely the experimental class and the control class; Develop learning tools consisting of syllabus and lesson plans (RPP) according to the material being taught. The second stage of the learning process. The learning used in the experimental class was carried out using Microsoft Power Point media and the control class was given treatment not using Microsoft Power Point media. The third stage includes: Giving tests to the two sample classes after learning ends, to see the results of the treatment given; Processing data from both samples, both the experimental class and the control class. In this study the data to be analyzed is data on student learning outcomes. Student learning outcomes were analyzed using the t-test formula to see differences in student learning outcomes between using

interactive media and without using Microsoft Power Point media. To process data using the t-test, first: 1. Normality test, and 2. Homogeneity test,

### 3. Results and discussion

#### 3.1 Results

Based on the research that has been done in the sample class, data is obtained about student learning outcomes. Data collection was carried out using an objective test consisting of 25 questions. Distributed to each class that has 21 students. The test is carried out at the end of the lesson.

##### 1. Normality Test

Based on the calculation of the tests carried out by the Liliefors test for the experimental class and control class, the values of Lcount and Ltable were obtained at a significant level of 0.05 for N = 21 as shown in the table below. With a note that if Lcount > Ltable, the data is not normally distributed. If Lcount < Ltable then the data is normally distributed.

Table 1. Calculation Results of the Liliefors Test for the Experiment Group and the Control Group

No	Kelas	N	Lhitung	Ltabel	Keterangan
1	Eksperimen	21	0.086199403	0.190	Normal
2	Kontrol	21	0.110800021	0.190	Normal

Based on the table above, it can be seen that both the experimental class and the control class have Lcount < Ltable, meaning that the data for the two sample classes are normally distributed.

##### 2. Homogeneity Test

Syafril (2019: 208) stated that "if the calculation results from the calculated chi square are smaller than the table chi square, it means that the data comes from a homogeneous group. Conversely, if the calculated chi square is greater than the table chi square, then the group is not homogeneous. The results of the homogeneity test calculation (Barlett test) can be seen in the following table

Table 2. Results of Barlett Test Homogeneity Test Calculations in the Experiment Group and the Control Group

Kelas	A	$\chi^2_{hitung}$	$\chi^2_{table}$	Kesimpulan
Eksperimen	0,05	0,021	3,841	Homogen
Kontrol				

Comparing the Chi Square table with  $dk = (2-1) = 1$  obtained  $\chi^2_{table} (1;0.05)$  of 3.841 at a significant level of  $\alpha 0.05$ . From the homogeneity test table it appears that  $\chi^2_{count}$  is smaller than  $\chi^2_{table}$  ( $0.021 < 3.841$ ), meaning that the experimental class and control class have a homogeneous variance.

### 3. Hypothesis Test

Put forward by Syafril (2019: 179), namely: "If the  $t_{count}$  is the same or greater than the  $t_{table}$  for  $\alpha 0.05$ , it means that there is a significant difference. If  $t_{count}$  is smaller than  $t_{table}$  for  $\alpha 0.05$ , it means that there is no significant difference. The following describes data processing using the t-test formula in table

Table 3. Data from the results of calculating the values of the Experimental Class and Control Class

Aspek	Kelas Eksperimen	Kelas Kontrol
	X1	X2
N	21	21
X	71.61	50.61
SD2	12.95	10.94

Based on the table, the calculation is carried out as follows:

$$t = \frac{\bar{X}_1 - \bar{X}_2}{\sqrt{\frac{SD^2 X_1}{N_2 - 1} + \frac{SD^2 X_2}{N_1 - 1}}}$$

$$t = \frac{71,61 - 50,61}{\sqrt{\frac{12,95}{20} + \frac{10,94}{20}}}$$

$$t = \frac{21}{\sqrt{1,194}}$$

$$t = \frac{21}{1,092}$$

$$t = 19,21$$

To test the hypothesis used t-test. From the results of hypothesis testing using the t-test, the following results are obtained:

Table 4. Calculation results for experimental class and control class using the t-test formula

No	Kelas	Hasil rata-rata kelas	thitung	ttabel	Kesimpulan
1	Eksperimen	71,61	19,21	2,01	Signifikan
2	Kontrol	50,61			

Based on the t table above with  $df = (n1 - 1) + (n2 - 1) = 40$ , then what is guided by the table is with a significant level of  $\alpha 0.05$ , the ttable value is 2.01. Thus the applicable criteria is  $tcount > ttable$  ( $19.21 > 2.01$ ). Which means that the accepted hypothesis is H1 and H0 is rejected. It can be concluded that learning outcomes using Microsoft Power Point learning media are higher than learning outcomes that do not use Microsoft Power Point learning media. So that there is a significant influence on student learning outcomes between the experimental class that uses Microsoft Power Point learning media compared to the control class that does not use Microsoft Power Point learning media.

### 3.2 discussion

Based on the research conducted, the results showed that the average value of the experimental class using Microsoft PowerPoint media was 71.61, which was 71.61 higher than the average value of the control class which did not use Microsoft Power Point media, namely 50.61. Based on the calculation of the t test (t-test) obtained tcount 19.21 while ttable at a significant level  $\alpha 0.05$  is 2.01. When compared, then tcount is greater than ttable, namely  $19.21 > 2.01$ . Which means that H1 is accepted. Thus the use of Microsoft Power Point media has a significant effect on student learning outcomes in theme 3 Healthy Food class 5 SDN 29 Gunung Sarik.

According to the results of the research above, the increase in student learning outcomes in the knowledge aspect for the experimental class was better than the control class indicating that learning using Microsoft Power Point media has a role in changing learning. So far, learning by not using Microsoft Power Point media has not been able to arouse students' enthusiasm for learning, with the Microsoft Power Point media making learning better.

This of course provides added value to the importance of the benefits of media in the learning process as stated by Sanaky (2013: 4): "that the media is useful for making teaching

more interesting so that it can foster learning motivation in students, clarifying the meaning of teaching materials to make it easier understood so that students master the teaching objectives well, become more varied learning methods, by combining verbal communication from the teacher with other media so that students do not get bored, and make students more involved in learning activities, not just listening, such as observing, demonstrating, presenting and etc."

An important reference for teachers in choosing the right media is by analyzing the character of learning, learning objectives, modifying or designing their own media. Next is understanding the use of media, analyzing students' responses to media and evaluating media after use with the aim of seeing the level of effectiveness and efficiency of media. For a teacher it is a must in choosing media based on suitability between material, methods, learning objectives and student characteristics.

#### 4. Conclusion

1. Based on the results of the data analysis that has been carried out, it can be concluded that student learning outcomes in Theme 3 Healthy Food are applied to class 5A as an experimental class to obtain a higher average score of 71.61 while the average value obtained in class 5B as a lower control class with an average of 50.61. So there is a difference in the average score between class 5A students as the experimental class and class 5B students as the control class.
2. The results of testing the hypothesis using the Test formula *thitung* with a significant level of 5% found  $t_{count} = 19.21$  greater than  $t_{table} = 2.01$ . From the explanation above, it can be concluded that there is a significant influence in the use of Microsoft Power Point media on student learning outcomes in Theme 3 Healthy Food class 5 SDN 29 Gunung Sariak.

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