

The Effect of Counseling About Prevention of Diarrhea on The Knowledge of Grade 3 And 4 Students At Budi Sastra Elementary School

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ABSTRACT: According to data from the World Health Organization (WHO) diarrhea is a disease that affects 1.5 million children every year, which means almost all geographical regions in the world. Every year there are around 1.7 billion cases of diarrhea with a mortality rate of 760,000 children. Diarrheal disease is still one of the main problems in society which is very difficult to overcome. The purpose of this study was to determine the effect of counseling on diarrhea prevention on the knowledge of grade 3 and 4 students at Budi Sastra Elementary School. Research This type of research is Quantitative. Pre-experimental design With the One Group Pre-Post Test Design. The population in this study were grades 3 and 4 of SD Budi Sastra totaling 104 people. The samples taken amounted to 84 respondents with the Proportional Random Sampling technique. The research instrument used a video and a questionnaire with a total of 20 questions about knowledge which was tested for validity with results obtained at 0.138 and a reliability test with a value of 0.87. Univariate data analysis using the frequency distribution and bivariate analysis using the Wilcoxon Signed Rank Test. The results of the study showed that most of the respondents had a sufficient level of knowledge in the pre-test (55%) and in the post-test, most of the respondents had a good level of knowledge (70%). The results of the Wilcoxon Signed Rank Test obtained a significance value of P-value 0.000 <0.05, which means that there is an influence of counseling on prevention of diarrhea on the knowledge of grade 3 and 4 students. It is hoped that schools can work together with local health centers regarding diarrhea

KEYWORDS: Diarrhea, Extension and Knowledge

INTRODUCTION

Diarrhea is a disease characterized by changes in the shape and consistency of stool from soft to liquefied and an increase in the frequency of defecation which is more than usual, namely 3 or more times a day which may be accompanied by vomiting or bloody stool (Saputri, 2019). School age children aged 6 – 12 years are an age group that is prone to nutritional disorders and disease, especially infectious diseases. The most common infectious disease experienced by school-aged children is diarrhea.

Diarrhea can be caused by bacterial, viral and parasitic infections. One of the bacteria that causes diarrhea is Escherichia coli bacteria. E. coli bacteria is a type of commensal bacteria, intestinal pathogen and extraintestinal pathogen that can cause urinary tract infections (Bakri, 2015). The presence of E. Coli bacteria has also been shown to have contaminated several types of food or drinks circulating in the community, especially snacks for school children.

According to the World Health Organization (WHO), the high mortality rate of children under five every year is caused by diarrhea. The incidence of diarrhea in Indonesia is 60 million per year and 80% are children (Riskasdas, 2018). The disparity between provinces for service coverage for diarrhea sufferers of all ages is between 6.7% (North Sumatra) and Banten (68.6%). Meanwhile, the disparity between provinces for coverage of services for toddlers with diarrhea is between 3.3% (North Sumatra) and Banten (55.3%). Based on Basic Health Research (Riskasdas) in 2018, it is stated that the prevalence rate in Indonesia for diarrhea at all ages based on the diagnosis of health workers is 6.8% without symptoms and 8.0% with symptoms, while the prevalence of diarrhea in toddlers is 11. 0% without symptoms and 12.3% with symptoms. Data from the Indonesian Ministry of Health (2019) in Basic Health Research (Riskasdas) for 2018, the age group 1-4 years (12.8%) and female gender (8.3%) are the groups with the most sufferers.

In everyday life, one of the causes of diarrhea is unsafe or contaminated food. Of the several sources of contamination, workers are the source with the greatest influence on food contamination. For example, in everyday life, in storing water at home or in the canteen or school stall, there is also the possibility of cross contamination from raw food to cooked food or from packaging or containers, food and cooking utensils or health status and hygiene and sanitation behavior. in food processing. Therefore, basic principles of food sanitation are very necessary so that consumers' own health can be protected from the dangers of food

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contamination and infectious disease organisms. Food or snacks that are often consumed by school children are very sensitive to pollution, which comes from food additives in the form of textile dyes, preservatives and artificial sweeteners (Widjaja, 2008).

The factors that influence counseling are the first factor, the provider of counseling, where in an extension, preparation, mastery of the material, appearance, and delivery of counseling are needed in language that is easy for the target to understand and comprehend. Second, there is the target factor, namely the target is seen from the level of education, social environment, customs and beliefs. Third, there is a process in extension where the time, place, number of targets need to be adjusted to the extension activities so that the process in extension can run smoothly (Maulana, 2020). Meanwhile, according to WHO, the aim of health education is to change individual and/or community behavior in the health sector.

School-aged children generally don't really understand about body hygiene, especially when break time comes, they play and eat so they forget to wash their hands. Hands are the main carriers of disease germs, therefore it is very important to know and remember that washing hands with soap is a healthy behavior that is very effective in preventing the spread of various infectious diseases such as diarrhea. Therefore, knowledge about the causes, prevention, management and treatment of diarrhea and knowledge about the complications of diarrhea in school children is very important (Suroso, 2013).

Results of a preliminary study carried out on May 8 2023 at Budi Sastra Elementary School located in Bandung City. The data obtained, especially in the Cibaduyut Kidul Community Health Center area, showed that in 2021 there were 730 people, and in 2023 the data obtained was 150. The number of female students at SD Budi Sastra 280 consisted of 52 students in class 3 and 52 students in class 4 based on The results of an interview with one of the 3rd and 4th grade teachers at Budi Sastra Elementary School said that in the last 3 months there were 20 children who did not go to school due to diarrhea. Based on initial studies, it is known that the snacking behavior of grade 3 and 4 students when buying food at school is not washing their hands first. Based on the results of questions and answers with 8 students, it was found that 7 students did not know about the prevention, treatment and complications of diarrhea, while 1 student who already knew the causes of diarrhea said that diarrhea was due to a viral infection but could not explain other causes of diarrhea. According to the elementary school teacher Budi Sastra, officers from the community health center have not yet provided educational programs regarding diarrhea education.

RESEARCH METHODS

The type of research used in this research is quantitative using a pre-experimental design. The population in this study were grades 3 and 4 at SD Budi Sastra. The sample taken was 84 respondents with the Proportional Random Sampling technique. The research instrument used videos and questionnaires with a total of 20 questions about knowledge, tested for validity with results obtained at 0.138 and a reliability test with a value of 0.87. Univariate data analysis using the frequency distribution and bivariate analysis using the Wilcoxon Signed Rank Test. After conducting research ethics, an ethical test number was obtained with No.120/KEPK/IKI/VII/2023

RESEARCH RESULTS

Table 1

gory	N	Presentase
Less	28	33%
Enough	46	55%
Good	10	12%
Total	84	100%

Source: Data primer, 2023

Based on Table 1, the results of the pre-test show that the majority of respondents (55%) had sufficient knowledge before being given counseling about preventing diarrhea to students in grades 3 and 4 at Budi Sastra Elementary School.

Table 2

gory	N	Presentase
Good	59	70%
Enough	21	25%
Less	4	5%
Total	84	100%

Source: Data primer, 2023

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Based on Table 2, the results of the post test showed that most of the respondents (70%) had good knowledge after being given counseling on preventing diarrhea in grade 3 and 4 students at Budi Literature Elementary School

Based on table 3, it shows that the knowledge value was good before being given counseling by a small number of respondents (12%) and increased after being given counseling by most of the respondents (70%).

Based on the results of statistical tests using the Wilcoxon Signed Rank Test above, a significance value and P-value of $0.000 < 0.05$ was obtained, indicating that counseling about diarrhea had a significant effect on the level of knowledge of Budi Sastra Elementary School students about preventing diarrhea.

Table 3

Category	KNOWLEDGE				P value
	Pre test		Post test		
	N	%	N	%	
Good	10	12%	59	70%	0,000
Enough	46	55%	21	25%	
Less	28	33%	5	5%	
Total	84	100	84	100	

Source: Data primer, 2023

DISCUSSION

1. Students' knowledge before being given counseling in grades 3 and 4 at SD Budi Sastra

The results of research on knowledge showed that before being given diarrhea education, a small percentage of all respondents (55%) 46 respondents had sufficient knowledge about diarrhea prevention knowledge.

The results of this research are in line with research conducted by Gurning (2014). Research conducted on grade V elementary school children as many as 30 children who were studied carried out a pre-test filling out a questionnaire and carried out health education. After that, a post-test was carried out filling out a questionnaire of 15 questions. The results obtained were that There was an influence of health education about diarrhea on knowledge of diarrhea prevention behavior in elementary school age children at SD Negeri 69 Manado. The results showed that the majority of subjects had a level of mental health knowledge that was in the sufficient category, namely 15 people.

Knowledge is the result of "knowing" and this occurs after people sense a particular object. Sensing occurs through the five human senses, namely: the senses of sight, hearing, smell, taste and touch. Most human knowledge is obtained through the eyes and ears (Notoadmodjo, 2014)

According to (Notoadmodjo, 2014) a person's knowledge can be influenced by several factors, one of which is the level of education. The level of education can increase insight or knowledge of a person. In general, someone with a higher level of education will have more knowledge than someone with a lower level of education. The knowledge itself is obtained both in formal education, namely during biology lessons by learning about diarrhea prevention knowledge.

In the opinion of researchers, the development of technology and communication has made information easier to obtain, one of which is through the mass media, for example through videos or posters. Obtaining information on health prevention of diarrhea means having a fairly broad knowledge of diarrheal disease, its causes, signs and symptoms, prevention and control of diarrhea and matters related to diarrhea. From now on, through the mass media, there has been a lot of discussion about health information. As the results of research conducted by Harsimanto, Eva, and Dina (2019) which showed that 30 out of 37 students used video media and posters by providing health education so that it can be said that there is a significant effect of health education using videos and posters on children's knowledge and attitudes in preventing diarrheal disease.

2. Student knowledge after given counseling in grades 3 and 4 at SD Budi Sastra

The results after being given about knowledge were obtained by the majority of respondents (70%), namely 59 respondents who had high knowledge.

This research is in line with research conducted by Dita (2016) Based on the results of the study, it showed a significant difference where before being given health education there was a significant decrease to 4 respondents for less knowledge and the average value of students' knowledge level increased to 8.30.

Based on the results of previous research by Saputra (2014) the results of students who received health education with the brainstorming method after the intervention were 7.56%, while for students who received health education with the lecture method with audio-visual media it became 7.59%, so diarrhea afterward given the intervention turned out to be quite good.

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In the opinion of the researchers, the increase in respondents' knowledge became better after being given diarrhea health education because of their awareness and interest in health and supported by appropriate sources of information that could influence one's knowledge.

It can also be a process of change in a person that is linked to achieving individual and community health goals. Health education cannot be given to someone by another person, but actually is a process of development that changes dynamically, in which a person accepts or rejects new information, attitudes, and practices related to the purpose of living a healthy life (Suliha, 2014).

3. The Effect of Student Knowledge Before and After Being Given Counseling About Diarrhea Prevention

The results of the analysis show that there is a change in the level of student knowledge before (pre) and after (post) using video-based learning media which can be seen from table 4 above. It is known that the statistical test results using the Wilcoxon Signed Rank Test above obtained significance values and The P-value is $0.000 < 0.05$, which indicates that counseling about diarrhea has a significant effect on the level of knowledge of Budi Sastra Elementary School students about preventing diarrhea. With 59 children out of 84 getting knowledge results in the good category, namely 70% using video. Based on the results of this study, it shows that diarrhea health education in this study is categorized as good knowledge. The knowledge categories used in this research are as follows:

Knowledge is the result of knowing and this occurs after people sense a particular object. Sensing occurs through the five human senses, namely the senses of sight, hearing, smell, taste and touch. Most human knowledge is acquired through the eyes and ears. Through diarrhea health education, there will be a transfer of information to respondents and then sensing the information so that the information they have increases and ultimately students' knowledge about diarrhea health becomes good (Notoadmodjo, 2014).

The results of this study are in accordance with Ernawati (2015) the results show about the effect of counseling on increasing knowledge about diarrhea in street children in Semarang that the average score of knowledge before counseling is 10.85. The results of Christyanti's research (2017) stated that the majority of participants experienced an increase in knowledge of 22 people. This is because the dominant value of the participants can be seen that the p value is $0.010 < 0.05$, which means that there is a significant difference between knowledge before and after counseling. This shows that participants can understand the material that has been conveyed by the speaker during the post test which is higher than the pre test score.

According to researchers, a person's knowledge can be influenced by several other factors such as the level of education, experience, and means of information. Students at Budi Sastra Elementary School had sufficient knowledge before the diarrhea health counseling was carried out due to the lack of regular visits and implementation of health education from teachers and health workers. During the research process the role of nurses as educators and facilitators is needed in increasing students' awareness and knowledge of health. Therefore the role of nurses as health workers has an important role in providing information to students about diarrhea health so that by having good knowledge, students can prevent diarrhea health problems that might occur.

CONCLUSION

Based on the results of research conducted in July 2023 on 84 respondents regarding "The Influence of Counseling on Prevention of Diarrhea on the Knowledge of Grade 3 and 4 Students at SD Budi Sastra" the research results obtained are as follows:

1. Knowledge of respondents in grades 3 and 4 before being given diarrhea counseling, most of the respondents 55% had sufficient knowledge about the effect of diarrhea counseling on diarrhea prevention knowledge.
2. Knowledge of respondents in grades 3 and 4 after being given diarrhea counseling, most of the 70% of respondents had good knowledge about the effect of diarrhea counseling on diarrhea prevention knowledge.
3. There is an influence of diarrhea education on knowledge of diarrhea prevention in grade 3 and 4 students at Budi Sastra Elementary School

SUGGESTION

1. For Budi Sastra Elementary School students

Through this research, it is hoped that schools can create a program to provide education on diarrhea prevention. This program will help students obtain correct and appropriate information regarding diarrhea prevention knowledge, especially for elementary school students

2. For the Immanuel Bandung Institute of Health

It is hoped that the Immanuel Bandung Institute of Health can influence diarrhea counseling on knowledge of diarrhea prevention in elementary school students by visiting schools that have never received education on diarrhea prevention before.

3. For Further Researchers

It is hoped that this research can be used as a data source for further researchers who have an interest in the effect of diarrhea counseling on diarrhea prevention knowledge in elementary school students and can develop it using health education methods about diarrhea in other ways.

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