THE EFFECT OF HEALTH EDUCATION WITH ANIMATION VIDEO MEDIA ON STUDENTS' KNOWLEDGE IN PERFORMING FIRST AID IN SYNCOPE

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ABSTRACT
Background: Fainting or syncope is a person's loss of consciousness (LOC=Loss Of Consciousness) caused by decreased blood flow to the brain. Syncope often occurs in students so knowledge of first aid in syncope is needed in the initial management so that it does not have a fatal impact and result in injury. It is estimated that there are 12 million cases of syncope in the world each year and in Indonesia as many as 35% of students have experienced syncope during school activities. Knowledge of first aid in syncope can be increased with health education using animated video media. Purpose: To determine the effect of health education using animated video media on students' knowledge in performing first aid for syncope. Methods: This research is a pre-experimental study using one group pretest and posttest with a quantitative research type. It's a sampling technique Simple Random Sampling, with a sample of 32 respondents. Data analysis using the Wilcoxon test. Results: Obtained the value of knowledge before the intervention was given at 11.00 and after the intervention was given at 15.00 with a p value of 0.01 <0.05. Conclusion: there is an influence on the value of knowledge before and after being given first aid health education in syncope with animated video media.

Keywords: Health Education, Knowledge, First Aid, Syncope, Video Animation

INTRODUCTION
Fainting or syncope is a person's loss of consciousness (LOC = Loss Of Consciousness) caused by decreased blood flow to the brain (Wiharyo et al., 2018). Syncope is an emergency condition in the cardiovascular department (heart and blood vessels) and is also one of several cases of injuries that often occur in schools (Suwardianto, 2022). Syncope is caused by 2 factors, namely external and internal. External factors, namely sufferers being under the hot sun or cold weather for too long and internal factors, namely emotions or shock (Kundre & Mulyadi, 2018). Syncope can occur due to decreased blood flow to the brain (Wiharyo et al., 2018).

A person who has syncope will experience several symptoms in their body. The following are the symptoms that are felt, which are characterized by a sudden loss of consciousness and body strength of an individual, accompanied by the recovery of the individual's condition (Febrina et al., 2017). In addition, the general symptoms of syncope are feeling tired all over the body, headaches, eyes that feel dizzy, breathing seems short and short (Sitorus et al., 2020).

The incidence of syncope in the world is estimated at 12 million cases each year (WHO, 2018). According to the European Society of Cardiology (2018) the frequency of syncope in the last 3 years is estimated at 34%. Syncope is common in society, about 20% of people have experienced at least one syncope in their life. Syncope can happen to anyone and at any time, one of them is school students. The peak prevalence of syncope occurs in adolescents aged 15 years (Oktavian et al., 2020). In Indonesia, as many as 35% of students have experienced syncope when carrying out school activities (RI Ministry of Health, 2021).
Syncope that often occurs is vasovagal syncope 21.1%. Hamilton gets syncope more often in women than men, whereas in the Framingham study the incidence of syncope was 3% in men and 3.5% in women, there was no difference between men and women (Tobing, 2019).

Based on the above data, many school students have experienced syncope. Students who experience syncope if they are not immediately helped can have a fatal impact and result in injury or even death because the brain does not get the blood flow it needs, this is also called the effect of suspension trauma (Damayanti, 2021). First aid is an immediate action for someone who is experiencing pain or injury (Kundre & Mulyadi, 2018). Often students do not know the correct first aid measures for fainting students. The lack of experience of students with first aid makes the experience they have also less. First aid is influenced by several factors such as age, gender, attitude, lack of knowledge, training, and experience related to first aid (Huda, 2019).

Handling when syncope occurs, students can provide first aid, so it must be done quickly and precisely even though it is only basic medical assistance. Medical assistance can be given based on medical knowledge that is known to many people. Delay in providing first aid will have a serious impact on students such as injuries that can be life threatening (Sitorus et al., 2020).

Based on the impact of syncope requiring a good role from health workers, one of the roles that can be carried out by nurses is the role of educator. The role of educators helps in expanding health knowledge so that they can increase knowledge after being given health education (Siregar et al., 2022).

Health education is a form of independent nursing action to help clients, both individuals, groups and communities, in overcoming their health problems through learning activities in which nurses act as nurse educators according to the duties of a nurse (Rahayu et al., 2022). Counseling is given through direct communication of important messages about syncope through the use of mass media.

Health education in order to get more effective results requires a health education media. One of the media that can be used is animated video media. Animated video is a type of media that can be used because this media has the advantage of using pictures and displays so that it is much more interesting and not boring. It is hoped that using this media can make it easier for students to understand so that it can affect students' knowledge in first aid for syncope (Sitorus et al., 2020). To get an increase in knowledge with maximum results, providing effective animated video media is 4-6 minutes (Prasetyo, 2021).

Research conducted by Sakti et al. (2018) regarding first aid education and training for fainting students at Binong Permai Middle School, Tangerang, obtained the mean pretest of knowledge regarding first aid in fainting conditions before training was 66.77 and the posttest average was 80.87. So it can be concluded, statistically there is a significant difference between the average knowledge of the participants before and after the training (p value 0.001).

Based on the results of the preliminary study that the researchers conducted through interviews with 10 class X students of SMA PGRI 02 Palembang, students said that syncope often occurred in other students while carrying out the ceremony and there was also no education about first aid for syncope being carried out at the school. From the data above, the researcher saw a problem from the background. So that research still needs to be done to find out more about the influence of health education with animated video media on students' knowledge in performing first aid for syncope.

MATERIAL AND METHODS

This research is research quantitative...
use pre approach experimental with design one group pre-test and post-test design. Population in study This is all students of class X SMA PGRI 2 Palembang. And amount sample as much 32 respondent. Taking sample use non-probability with technique simple random sampling. Study This consists from variable independent that is health education with the media animation videos. And variable dependent that is knowledge knowledge of first aid in syncope.

Study This done with use animated video media about first aid for syncope performed at SMA 2 PGRI Palembang in April of the Year 2023. Instrument Which used in study This is questionnaire knowledge about first aid for syncope amount 16 per yar.

Study This held with a number of stages that is Look after letter permission study with bring letter from Institute Knowledge Health And Technology Muhammadiyah Palembang which was proposed to Body Unity Nation And Political then submitted to the Department of Education Palembang Which addressed to SMA 2 PGRI Palembang. Then before conducting research, the researcher must observe the research location first and then ask permission from the school principal to carry out the research. After being given permission to carry out the research, the researcher approached and carried out the introduction stage to the respondent, then asked for approval to become a respondent by explaining the purpose of the research. When the day of the study arrived, the researcher collected samples in one room and then prepared an informed consent sheet to be signed as one proof that he was willing to be a sample in the study. Prior to the intervention, the study distributed questionnaire sheets to respondents by drawing lots according to their absence as a pretest to fill in for 10 minutes, after completing the questionnaire sheets were collected again. The next stage is that the researcher intervenes using animated video media that lasts 3 minutes 20 seconds for 1 x screening by: The researcher provided Health Education with animated video media which was shown using infocus. Respondents were asked to pay attention when the researcher gave counseling and when the animated video was played. The researcher distributed the same questionnaire sheets to the respondents as a posttest to be filled in for 10 minutes, after completion. Questionnaire sheets were collected again for evaluation or to re-check the completeness of the data collected by the respondents. After providing health education with animated video media, it is hoped that there will be an increase in students' knowledge in performing first aid for syncope. Researchers perform data processing and data analysis from the beginning to the end of the respondents. Data analysis uses SPSS to produce univariate and bivariate values. The data obtained was tested for normality using the Shapiro Wilk test with the results of the data normality test not being normally distributed so that further data analysis was carried out using the Wilcoxon test.

RESULTS

1. Analysis univariate
   a. Prior Student Knowledge

   Given Health Education Media Video Animation

   Table 1 Prior Knowledge of Students Given Health Education Media Video Animation

<table>
<thead>
<tr>
<th>Variabel</th>
<th>Median</th>
<th>Min</th>
<th>Max</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pre test</td>
<td>11</td>
<td>9</td>
<td>12</td>
</tr>
</tbody>
</table>

   Based on table 1 it was found that value knowledge family before Health Education Media Video Animation provided with animated video medias is 11 with a minimum value of 9 and mark maximum 12

   b. After Student Knowledge

   Given Health Education Media Video Animation

   Table 2 Student Knowledge Value After Being Given Health Education Media Video Animation

<table>
<thead>
<tr>
<th>Variabel</th>
<th>Median</th>
<th>Min</th>
<th>Max</th>
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</table>

   Being Given Health Education Media Video Animation provided with animated video medias is 12 with a minimum value of 9 and mark maximum 12.
Based on table 2 it was found that value knowledge student after intervention is provided with median animated videos is 15 with a minimum value of 12 and mark maximum 18.

2. Analysis bivariate
   a. The effect of health education on animated video media on students’ knowledge in performing first aid for syncope

<table>
<thead>
<tr>
<th>Variable</th>
<th>Median</th>
<th>Min</th>
<th>Max</th>
<th>P-values</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pre test</td>
<td>11</td>
<td>9</td>
<td>12</td>
<td></td>
</tr>
<tr>
<td>Post test</td>
<td>15</td>
<td>12</td>
<td>16</td>
<td>0.000</td>
</tr>
</tbody>
</table>

   Based on table 3 above results of bivariate analysis using test Wilcoxon obtained mark p-values 0.000 (<0.05) which shows that there is influence Health education with animated video media on students’ knowledge in performing first aid for syncope.

DISCUSSION

Influence Health Education Using Video Animation Media Toward Student Knowledge in Performing First Aid For Syncope

   Based on results analysis bivariate using Wilcoxon test obtained value p-value 0.000 (<0.05) Which showing There is influence Media health education animation video against knowledge students in performing first aid for syncope with mark knowledge student before Media health education Animated videos are median 11. And after health education media Animated videos are median 15.

   The results of this study are supported by several previous studies that show that there is an effect before and after being given an intervention with animated video media due to a change in the views of each individual. This is because learning using animated videos has a significant effect on changing individual awareness (Sitorus et al., 2020; Wulandari & Linggardini, 2023; Ilhami et al., 2022; Paradela & Rizal, 2022).

   Animated video is one of the health education media that can be used because it displays pictures and sound so that it makes students feel more fun and less bored. It is hoped that in this way students can become more focused and the material conveyed can be understood easily (Paradela & Rizal, 2022; Ilhami et al., 2022; Wulandari & Linggardini, 2023). The use of animated videos also utilizes the ability of the sense of sight and sense of hearing. The use of the senses in digesting information will affect one’s understanding of the information conveyed. This is in line with Edgar Dale’s cone of experience theory that seeing can increase knowledge by 20% and hearing by 30% so that it is more effective than just seeing or just hearing (Devhy et al., 2021).

   The use of animated videos as a medium for health education is considered very effective because animated videos are moving images that are sequential and manipulated and have the advantage of attracting attention and can provide an increase in educational knowledge compared to using the lecture method because the lecture method is considered ineffective and makes respondents easily bored and unfocused (Iskandar et al., 2022). The most effective duration of animated videos in increasing knowledge is 4 to 6 minutes (Hanifah et al., 2020). Increasing knowledge with animated video media can be given 2 repetitions or more so that respondents can utilize almost all of their sensory organs. The more senses used, the clearer the information the respondent gets and the more he remembers it. Repetition of animated
videos provides an increase in long-term memory, however, if the information is not repeated, knowledge only reaches short-term memory (Afifaturrohma & Purnasari, 2020).

Knowledge is the result of curiosity through sensory processes, especially in the eyes and ears of certain objects. Knowledge is also the most important domain in forming one's actions, therefore knowledge about first aid for syncope is very important because it can influence properly and correctly providing first aid for syncope so that it can reduce the fatal impact of syncope (Pratiwi & Anggiani, 2020).

Based on the results of the research, theory and related journals, the researchers assumed that there was an effect before and after being given Health Education on students’ knowledge of first aid for syncope. In this study the provision of health education using animated video media. The video animation method in this study helps students understand and be able to apply the information provided when given Health Education. This can be seen from the significant change in respondents regarding first aid for syncope before and after being given health education. The attention that the respondents gave showed an interest in providing health education using animated video media, with this also affecting the respondents’ knowledge.

CONCLUSION AND SUGGESTION

Conclusion

Based on the results of research on the effect of health education on knowledge students in performing first aid for syncope with animated video media, it can be concluded that of the 32 respondents, namely:

1. It is known that the value of students' knowledge before being given health education is 11.00.
2. It is known that the value of students' knowledge after being given health education is 15.00.
3. There is an effect of providing health education using animated video media on students' knowledge in performing first aid for syncope with a p value of 0.001 <0.05.

Suggestion

1. For SMA PGRI 02 Palembang

This research serves as input and learning material for students on first aid for syncope and to understand the importance of health education as knowledge that needs to be learned in order to avoid the effects of syncope.

2. For Educational Institutions

The results of this study are expected to serve as additional information material regarding emergency first aid for syncope that can be used for educational development and additional references for the next level in making a thesis in the nursing science department.

3. For further researchers

For further researchers, this can be used as basic data for further research. It is hoped that they can continue research on first aid for syncope by using the Two group pre-test and post-test design approach. So that there are comparison groups or with other more in-depth variables, for example, attitude variables in order to get more complex results.

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CONFLICT INTEREST

Study This No There is potency conflict interestWhich reported by the author

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