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The Correlation between the Use of Audio-Visual Learning Media and Children's Listening Skill in Suwawa Selatan

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Abstract—The purpose of this study is to determine the correlation between the use of audio-visual learning media and children's listening skill at Group B of kindergarten in Bone Bolango Regency, Gorontalo. Employing a quantitative correlational method, this study involved 30 kindergarten children as the population and sample; total sampling technique was applied. Further, the data were collected from the observation. The results of the study and statistic calculation show a correlation coefficient $r_{count} = 0.590$ in which the value of $r_{table} = 0.361$, meaning that the utilization of audio-visual learning media determines 34.81% of the listening skill. The remaining 65.19% is determined by other factors excluded in this study. This is to say that H_0 is rejected and accepts H_a , or in other words, the research hypothesis "there is a correlation between the use of audio-visual learning media and children's listening skill at group B of kindergarten in Suwawa Selatan Sub-district, Bone Bolango Regency" is accepted.

Keywords—visual learning media, listening skill, kindergarten

I. INTRODUCTION

Education is one of the systems that forms a big country, particularly in the field of education. For this reason, establishing a country requires an efficient and quality education system as an effort carried out by the government to realize such a system. According to Act Number 20 on National Education System [1], education is a conscious and well-planned effort in creating a learning environment and learning process, so that students will be able to develop their full potential for acquiring spiritual and religious strengths, developing self-control, personality, noble characters, and skills that one needs for him/herself, for the community, for the nation, and for the country. Education refers to one of the conscious efforts and performed system; thus, it is able to optimally shape the students.

Based on the law, this being said that early childhood education is the most appropriate time for children to grow and develop due to the availability of various things they can learn as an asset for the subsequent development of age [2]. By early childhood education, it is expected that every aspect of child development and skills can be well-stimulated in 3rd Icam Sutisna Department of Early Childhood Teacher Education Universitas Negeri Gorontalo Gorontalo, Indonesia icamsutisna@ung.ac.id

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which it requires audio-visual media in the learning process. Audio-visual media can stimulate children's skills, one of which is the listening skill. This is in accordance with the theory of the information process, information will remain in long-term memory if it is well received and sensory stimulated through audio-visual media [3]. Information will be more effectively absorbed in memory and add to the child's learning experience because the use of audio visual media is in accordance with the stages of children's cognitive development namely concrete pre-operational. at this stage the child obtains information through concrete objects [4].

Learning media is used to deliver messages from the sender to the receiver, so that it can stimulate the mind, feeling, interest, and attention of the students to make the learning process develop. Learning media are tools to deliver messages, to stimulate the mind, feeling, and willingness of the students to support the learning process [5],[6]. Media in a narrow meaning, are in the form of graphics, photos, mechanical and electronic devices that are used to capture, process, and convey information; in a broad meaning, media refer to activities that can create a condition that allows students to acquire new knowledge, skills, and attitudes [7].

In this study, one of the skills that can be stimulated using audio-visual media is listening. Listening is a process of listening to the symbols of oral language in a serious, careful, understandable, and appreciative way as well as understanding the meaning of communication delivered nonverbally [8]. In addition, listening is a process of writing a language that is interpreted in mind [9].

The preliminary observation conducted in all kindergartens in Suwawa Selatan sub-district, Bone Bolango Regency of Gorontalo revealed that some children found listening skill difficult. Learning activities, such as observing and finding out information, giving suggestions, listening to friends' opinions, and sharing ideas with them, play a very important role in the learning process.

Besides, the provision of audio-visual learning media was still ineffective, specifically in terms of learning delivery. Based on the preliminary observation, audio-visual learning media were very influential to children's listening skill since they would be able to give suggestions to and sharing ideas with the other children during the learning process [10]. In the other hand, the world is in the era of revolution 4.0 and will enter the era of 5.0. but in some regions in Indonesia, it is still difficult in terms of technology.

The problem of this study is whether or not using audiovisual learning media correlates with children's listening skill at Group B of kindergarten in Suwawa Selatan Sub-district, Bone Bolango Regency.

Given this condition, the researchers seek to determine the best solution for the above problem by conducting a study entitled "The correlation between the use of audio-visual learning media and children's listening skill at Group B of kindergarten in Suwawa Selatan Sub-district, Bone Bolango Regency, Gorontalo".

II. METHOD

This study was conducted in kindergarten in Suwawa Selatan sub-district of Bone Bolango Regency from January to February in the academic year 2019/2020. As many as 120 children aged 5-6 years from five schools in Suwawa Selatan sub-district were involved as the population. Off the five schools, only two of them had not applied audio-visual learning media in the classroom. Hence, the population was reduced to 70 children. Nevertheless, after conducting the study, only 50 children participated as the research population. In one school, the number of samples was less than 20 children that it came to a decision to take 20 children aged 5-6 years as the research sample.

The data were collected from observation and a questionnaire distributed to the children, assisted by the teacher and the data of children's listening skill. Data analysis in this study was a process of analyzing the collected data obtained from the observation results. The data were analyzed using correlation coefficient analysis to examine the correlation between X and Y. Employing a quantitative correlational approach, this study used the following research design in figure 1:



Fig. 1. Research Design of Variable X towards Variable Y

X = Audio-visual learning media

Y = Listening skill

The X variable in this study is the use of audiovisual media. X variable data were collected by giving questionnaires to children about the use of audiovisual media by the teacher in the learning process. the questions in the questionnaire are given through conversation techniques. This is because the research subjects are still 5-6 years old. some questionnaire questions include the clarity of the media with what the teacher tells, relating to the colors used in the media, and the suitability of the type of audio-visual media.

The Y variable in this study is listening skill. Y variable data is collected through observations that are converted into quantitative data about children's listening skill. observation guidelines include the ability of children to understand and respond to messages contained in symbols of spoken language.

III. RESULT

A. The Use of Audio-Visual Learning Media

The data on the use of audio-visual learning media (X) were collected from a questionnaire distributed to the children assisted by the classroom teacher. The questionnaire was in the form of questions and answers for the children in the site area. Based on the questionnaire scoring results, the data are presented below in tabel 1.

TABLE I. DATA RESULT AUDIO-VISUAL LEARNING MEDIA

Ν	Maximum score	Minimum score	Mean X
30	77	48	64

The above table indicates that the highest and lowest score achieved by 30 children are respectively 77 and 48, with an average score (mean) of 46. The median value of the data set is 65.5; the mode value that has the largest frequency or occurs most often is 68; the standard deviation (S) is 7.1.

The description about the scoring frequency of the use of audio-visual learning media (variable X) is presented in Appendix 6, and this reveals that most of the respondents answer above numbers 63 to 67 and 68 to 72. Accordingly, the distribution is described in the following histogram (figure 2):



Fig. 2. Frequency Distribution of the Score of Audio-Visual Learning Media Use

The graphic shows that two respondents have scores ranging from 48 to 52; five respondents with scores ranging from 53 to 57; four respondents arrive at scores ranging from 58 to 62; eight respondents reach scores ranging from 63 to 67 and 68 to 72 respectively; three respondents get scores ranging from 73 to 77. These observation results signify that the use of audio-visual learning media is in high criteria.

B. Listening Skill

The data of listening skill (Y) were collected from observation carried out to the children in the site area. Based on the observation scoring results, the data are described below in tabel 2.

TABLE II. DATA RESULT LISTENING SKILL

Ν	Maximum score	Minimu m score	Mean X
30	76	54	67.7

The above table reveals that the highest and lowest score achieved by 30 children are respectively 76 and 54, with an average score (mean) of 67.7. The median value is 37.94; the

Figure 4.

0 4

standard deviation is 6.1. The results of the questionnaire obtaining the scoring frequency of children's listening skill in the site area show that a lot of them arrive at a score ranging from 70-73. The frequency distribution is displayed in the following histogram (Figure 3):



Fig. 3. Observation Distribution of Listening Skill

The graphic signifies that three respondents get scores ranging from 54 to 57; two respondents with scores ranging from 58 to 61; five respondents arrive at scores ranging from 62 to 65; six respondents reach scores ranging from 66 to 69 and 74 to 77; eight respondents achieve scores ranging from 70 to 73. These observation results imply that children's listening skill at group B of Kindergarten in Suwawa Selatan sub-district, Bone Bolango Regency is in a high position.

The data normality testing towards the two examined variables shows a normal result; therefore, the use of parametric statistics for hypothesis testing can be continued. The formula is "Y" $\hat{}= a + b X$. so that this study obtains the regression equation of "Y" $\hat{}= 35.34 + 0.50 X$. This indicates that every change in one unit on variable X (the use of audio-visual learning media) will be followed by the average change in 0.50 unit on variable Y (listening skill).

The regression linearity and significance test are intended to depict the linear correlation. The regression linearity of the value of $F_{count} = 1.40$ in the significance level $\alpha = 0.05$, the numerator degree of freedom = 16 and the denominator degree of freedom = 12; hence, F_{table} (0.95) (16.12) = 2.62. The testing criteria are $F_{count} < F_{list}$, so that the hypothesis stating that linear regression of Y towards X with the equation $\widehat{Y} =$ 35.34 + 0.50 X can be accepted in the significance level $\alpha =$ 0.05. This regression equation implies that every change (increase or decrease) in 35.34 unit on the use of audio-visual learning media will be followed by the average change in 0.50 unit on listening skill. Moreover, the regression significance test obtains the value of $F_{count} = 14.64$ in the significance level $\alpha = 0.05$, the numerator degree of freedom = 1, and the denominator degree of freedom = 28; thus, F_{table} (0.95) (1.28) = 4.20. The testing criteria are $F_{count} > F_{list}$, so that the regression equation is significant and acceptable, meaning that the regression equation $\hat{Y} = 35.34 + 0.50 \text{ X}$ is relevant to the testing criteria and can be used as a measure in the



continuation of data analysis. The regression linier graph is in

Fig. 4. The Correlation between the Use of Audio-Visual Learning Media and Listening Skill

20

Variable X

30

40

10

The regression line from the collection of observation data is linear, the extent to which variable X is correlated with variable Y can be determined through the correlation coefficient (*r*). The calculation result reveals that the correlation coefficient reaches 0.0590. It is implied that the correlation coefficient is in a moderate category; hence, the determinant coefficient arrives at 0.3481. Consequently, the correlation between the use of audio-visual learning media and listening skill gets the percentage of 34.81%; the remaining 65.19% of listening skill is determined by other factors excluded in this study. The correlation coefficient significance using the product-moment is $r_{count} > r_{table}$, the correlation coefficient is significant.

IV. DISCUSSION

This study investigates the correlation between independent and dependent variables. By the results of this study, it is empirically proven that the independent variable does determine the dependent variable. The independent variable is the use of audio-visual learning media, and the dependent one is listening skill. This study was conducted in Group B children of kindergarten in Suwawa Selatan Subdistrict, Gorontalo Regency. The results of correlation coefficient in this study can prove that the research hypothesis "there is a correlation between the use of audio-visual learning media and children's listening skill at group B of kindergarten in Suwawa Selatan Sub-district, Bone Bolango Regency" is accepted, and the research purpose is achieved.

Based on the results of the questionnaire and observation, the use of media that is appropriate to the material and the age level provides a positive relationship with listening skills. In accordance with one of the results of the study, if you only use one type of audiovisual media repeatedly without variation and pay attention to the needs of students, it will not provide significant effectiveness [11].

Audiovisual media can be used interchangeably in several learning syntaxes as needed. during brainstorming through motion and song activities, or during discussions while telling stories or when playing games [12]. Audio-visual media such as drama, staging, film, television, and VCD can be simultaneously or directly listened to and seen; these media move the hearing and sight senses simultaneously. This is in accordance with the information process system. Information will remain in long-term memory if the child's attention is stimulated. stimulation of the child's sensory can be done using audio-visual media [13].

Listening is a skill to understand language sounds pronounced by other people and changed it into meaning to be processed, concluded, and responded. This is one of the communication activities to be able to receive information from other people. In addition, listening as a process of comprehensive, attentive, accomplishable, and appreciative activity to gain oral information [14]. Listening includes the process of listening to and understanding information; it is started from the listening activity to the comprehension of what one has listened to [15].

Learning process utilizing audio-visual learning media has optimized teachers' role as a motivator; it is evidenced by students' attention and motivation to participate in the listening process during the lesson [16]. Students are actively involved in the learning activities, including observing, finding out information, giving suggestions, listening to friends' opinions, and sharing ideas with friends by using audio-visual learning media [17],[18].

V. CONCLUSION

The research hypothesis "there is a correlation between the use of audio-visual learning media and children's listening skill at group B of kindergarten in Suwawa Selatan Sub-district, Bone Bolango Regency" is proven by linear line graphic and is accepted. This study provides some suggestions, as follows: Teachers should use audio-visual learning media that are in accordance with children's characteristics and are able to improve their listening skill. Further studies are expected to choose audio-visual learning media as part of the learning activities, i.e., observing, finding out information, giving suggestions, listening to friends' opinions, and sharing ideas with friends, so that effective results regarding children's listening skill will be accomplished.

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