



Effectiveness of Learning Video Skills to Recognize Eclipses for the Physically Impaired YPAC SUMBAR

Muhammad Sabri Fadhillah Tyazal¹, Nurhastuti², Damri³, Johandri Taufan⁴

¹Pendidikan Luar Biasa, ²Fakultas Ilmu Pendidikan, ³Universitas Negeri Padang, ⁴Indonesia

Corresponding Author E-mail : fadilmasterphone4@gmail.com

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Abstrak

Penelitian ini membahas tentang efektifkah media video pembelajaran untuk mengenal mengenal gerhana bagi anak tunadaksa. Selain itu, media video pembelajaran ini tidak hanya meningkatkan kemampuan anak mengenal gerhana namun penggunaan media video pembelajaran yang tepat dan bervariasi dalam proses pembelajaran dapat meningkatkan motivasi belajar dan dapat mengurangi sikap pasif siswa. Video adalah media yang dapat dilihat oleh mata dan dapat didengar oleh telinga serta merupakan jenis media audio visual. Metode penelitian yang digunakan adalah Single Subject Research (SSR) dengan desain A-B-A. Variable penelitian ini meningkatkan kemampuan mengenal gerhana bagi anak tunadaksa. Teknik dalam pengumpulan data berupa tes dan alat pengumpulan data berupa instrument ceklis. Hasil penelitian menunjukkan bahwa kemampuan mengenal gerhana anak tunadaksa meningkat setelah menggunakan media video pembelajaran. Dibuktikan dengan adanya peningkatan mengenal gerhana dari kondisi baseline ke kondisi intervensi setelah diberikan intervensi

Kata Kunci : Gerhana, Media Video Pembelajaran, Tunadaksa.

Abstract

This study discusses the effectiveness of learning video media to recognize eclipses for children with disabilities. In addition, this learning video media not only improves children's ability to recognize eclipses but the use of appropriate and varied learning video media in the learning process can increase learning motivation and can reduce students' passivity. Video is a medium that can be seen by the eyes and can be heard by the ears and is a type of audio visual media. The research method used is Single Subject Research (SSR) with A-BA design. The variable of this research is improving reading skills for children with disabilities. Techniques in data collection in the form of tests and data collection tools in the form of checklist instruments. The results showed that the ability to recognize

eclipses for children with disabilities increased after using learning video media. Evidenced by an increase in recognizing eclipses from baseline conditions to intervention conditions after being given intervention.

Keywords: Eclipse, Learning Video Media, Physically disabled.

Introduction

Children with disabilities are children who have limited mobility and require special treatment. This limitation of movement occurs before, after, or after birth, causing abnormalities in bones, muscles, and joints that interfere with overall body function. In general, children with physical disabilities have impaired mobility and intelligence, either partially or completely (Nurhastuti, 2019). As according to (Marlina, 2015) Children with tunadakasa are children who experience physical disorders related to bones, muscles, joints, and the nervous system, so that their skills can develop effectively, they need special educational support. Tunadaksa is a person with movement disorders caused by congenital neuromuscular and bone disorders, diseases or accidents, including cerebral palsy, amputation, and paralysis (Onah, 2017).

While people with disabilities according to (Wulandari, 2016) are a form of loss of the ability of a part of the body to carry out its function due to disruption of normal function due to injury, disease or imperfect development, disorders include physical defects or injuries, physical and health disorders or injuries and disorders. Or damage caused by brain and spinal cord injuries, so that for educational purposes requires special services and methods Because of the obstacles they have, they have difficulty in mobility and completing some tasks related to physical completion (Utami et al., 2023). Basically, children with disabilities do not have obstacles to their intelligence, so they should be able to absorb lessons like children in general. If the

teacher is able to provide special attention and special learning methods that are considered to be able to help learning for children with disabilities, then they should be able to absorb lessons like other children.

Article 5 of the Decree on the National Vocational Training System, number 20 of 2003 reports "Every citizen of the country has the right to quality learning" not only for natural children but also for children with special needs (Jannah et al., 2015).

For learning itself is an interaction that has normative values and goals, meaning that during the learning process at school, teachers still comply with the rules and guidelines in accordance with the requirements of inclusive schools (Ardisal & Damri, 2013). During learning, the use of learning media can increase students' willingness and interest and motivate students during learning so that it affects students' psychology (Farista & M, 2018). In teaching and learning activities, students play a role in receiving lessons. Students connect with messages (media) through their senses. Students are asked to use their senses through the media (Patrizar et al., 2013). During learning, the use of learning media can increase students' willingness and interest and motivate students during learning so that it affects students' psychology (Farista & M, 2018). In teaching and learning activities, students play a role in receiving lessons. Students connect with messages (media) through their senses. Students are

asked to use their senses through the media (Patrizal et al., 2013).

Video is included in motion audio visual media to record it using video, and broadcasting it through one of them through android, tv etc. The benefits and functions of a learning media are to make it easier for teachers to carry out the learning process that allows students to absorb learning experiences by mobilizing all learning resources effectively and efficiently. The media is tasked with attracting students' interest in the content being taught so that the learning process is not boring (Andriyani et al., 2020).

Natural science is a field of study that examines living things, natural events, and the environment. Then, science learning often requires students to understand abstract concepts and visualize the scientific process (Permatasari et al., 2019) While natural science is all general knowledge about nature and the environment that comes from the results of human activities in scientific work and continues to be improved (Astuti et al., 2020).

The Big Indonesian Dictionary (KBBI) defines an eclipse as the event of the moon/planet being covered by the sun which is blocked by the earth, or the occurrence of partial or full (overall) darkness from the sun/moon unnaturally seen from the earth. In other words, a solar eclipse can be understood as an astronomical event that occurs when the shadow of an object is blocked by another object. A solar eclipse is an event that occurs when the moon's shadow blocks the sun's rays, thus preventing all of its light from reaching the earth's surface and preventing the earth from receiving sunlight (Pary et al., 2023) While for the moon is partially or completely blocked sunlight from reaching the moon by the earth. A lunar eclipse is also said to occur

when the moon is directly opposite or facing the sun (Azmi et al., 2018).

Based on preliminary studies that have been carried out, the author tries to conduct written tests on students' knowledge related to lunar and solar eclipses that have been taught. It was found from the test results that student A had not fully mastered the material on the orbital movement of the earth and the moon in the solar system. With the material taught about the orbital movement of the earth and the moon in the solar system and the absence of learning media support so that students understand the concepts of learning. To increase children's enthusiasm for learning, researchers want to try and teach them how to utilize new technology in addition to teaching them how to use books and visual media (Hendri et al., 2019). After talking with the homeroom teacher regarding students' abilities, the author suggested using videos to improve students' skills about solar eclipses and lunar eclipses because the instructor had never used learning technology before in learning in the form of videos, for the learning video itself I designed the learning video myself about solar eclipses and lunar eclipses.

Method

A type of experimental research using Single Subject Research (SSR), quantitative research methodology will be used in this investigation. . According to Tawney and Gas, single subject research (SSR) is experimental research conducted to determine the magnitude of the intervention given to children repeatedly within a certain period of time. The research was conducted at SLB YPAC SUMBAR, Alai Parak Kopi, Kec. Padang Utara, Padang City, West Sumatra. The intervention was carried out with a time of 90 minutes, the meeting was conducted 16 times. The subject of this research is a child with the initials A and

female gender, 17 years old in class XI SLB YPAC SUMBAR who has the initial ability for academic ability is quite good in terms of understanding and interaction in the teaching and learning process, but during the learning process the teacher tends to only explain verbally without using concrete media so that children have difficulty in understanding the material to be conveyed. Tests are techniques or instruments used to assess student proficiency and include questions or exercises in either written or oral form. Tests are used to calculate children's initial abilities and to measure children's abilities after intervention.

The purpose of the research is to and using the A-B-A approach method. research collects from the data obtained during the research. Condition data (A1) is data obtained during measurement and data collection. Condition data (B) is the power obtained during the intervention. And condition data (A2) is the data obtained to make the conclusion that between the independent variable and the dependent variable there is a relationship. The research will be carried out 14 times a meeting, where there are 3 stages to get data, namely: baseline 1 (A1) carried out 4 meetings, (B) intervention carried out 7 meetings, and (A2) baseline 2 carried out 3 meetings.

Result

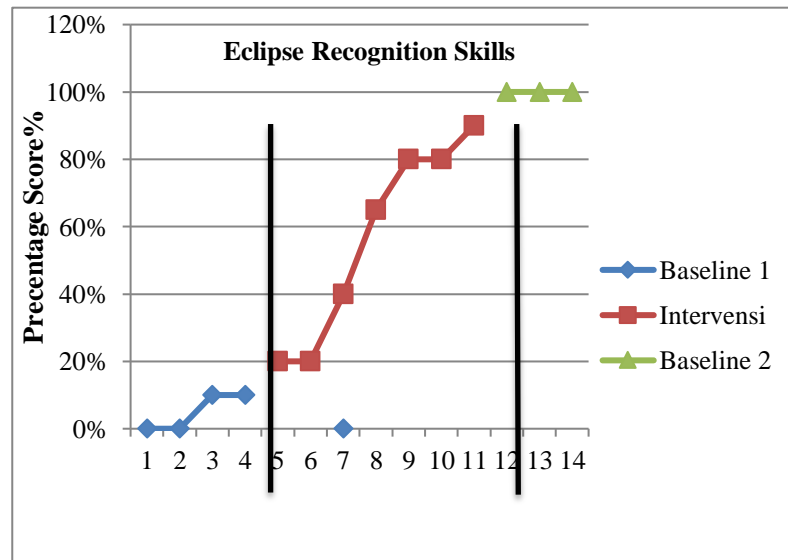
In the research conducted 14 times a meeting, where there are 3 stages to get data, namely: baseline 1 (A1) carried out 4 meetings, (B) intervention carried out 7 meetings, and (A2) baseline 2 carried out 3 meetings.

Baseline 1 (A1) data is obtained from observations of children with disabilities regarding the ability of children to recognize eclipses through learning video media. Data

based on the ability of children with disabilities to recognize eclipses through learning video media will be carried out 4 times a meeting for 30 minutes with a percentage of 0%, 0%, 10% and 10%. As for Intervention (B), children have begun to be able to answer questions related to the eclipse given. There are percentages of 20%, 20%, 40%, 65%, 80%, 80% and 90%. Finally, at Baseline A2, there are percentages of results of 100%, 100%, and 100%.

Based on the data collected at 3 stages, which are baseline A1, Intervention B, and baseline A2, the researcher ends the observation because the data has shown a stable condition at the 14th meeting. To make it easy to understand, the researcher summarizes each stage in the form of a graph below :








Graphics 1. Data Analysis Of Ability To Recognize Eclipses Through Video Learning



According to the data obtained for each condition at (A1), (B), (A2) on children's ability to recognize eclipses through learning video media, the A1 condition was carried out for 4 meetings with the results of 0%, 0%, 10%, 10%. The intervention condition (B) was carried out 7 times with the results of 20%, 20%, 40%, 65%, 80%, 80%, 90%. From the data above, it explains that children's ability to recognize eclipses through learning videos has increased. In the second baseline condition (A2), 3 meetings were conducted with the results of 100%, 100%, 100%. From the data above, it shows that the ability to recognize eclipses through learning video media is flat.

The recapitulation table of analysis in conditions:

Table 1. Summary of In Condition Analysis

	Baseline (A1)	
	Intervensi	
	Baseline (A2)	
	Mean	
	Upper Limit	
	Lower Limit	
	Change Limit	

The recapitulation table of analysis in conditions:







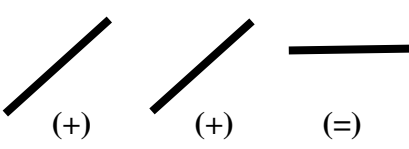
No	Condition	A1	B	A2
1	Condition length	4	7	3
2	Trend estimation			
3	Stability trend	(+) 50%	(+) 33%	(=) 100%
4	Trend trace data			
5	Stability level and range	(+) Variabe 1 0%- 10%	(+) Variabe 1 20%- 90%	(=) Variabe 1 100%- 100%
6	Level of change	10 - 0 = 10 (+)	90 - 20 = 70 (+)	100- 100 =0 (=)

Table 2. Recapitulation Of Intercondition Analysis

Condition	A2/B/A1
Number of variables changed	1
Change in trend	
Change in stability tendency	Unstable Unstable Stable
Level of change	
1. Level of change in condition B/A1	20% - 0% = 20%
2. Level of change in condition B/A2	100% - 20% = 80%
Percentage of overlap	
1. In the baseline condition (A1) with the intervention condition (B)	29%
2. In the baseline condition (A2) with the intervention condition (B)	43%

Based on the results of data analysis, the use of learning video media shows an increase in children's ability to recognize eclipses in class XI at SLB YPAC SUMBAR. The learning outcomes of students with physical disabilities can be improved by using this learning video. This is shown through analyzing the data presented graphically using the A-B-A pattern. Baseline conditions (A1) measuring children's ability to identify eclipses obtained results of 0%, 0%, 10% and 10%. For intervention conditions (B) the child's ability to get results 20%, 20%, 40%, 65%, 80%, 80% and 90%. And the baseline condition (A2) the child's ability is obtained 100%, 100% and 100%. Based on the percentage obtained, it can be seen that from the first to the last condition has increased. Thus, through this percentage, the formulation of problems based on the findings of this study, the ability of people with disabilities in detecting eclipses is improved by YPAC SUMBAR video learning media.

Conclusion

This study aims to determine the effectiveness of the ability of learning videos to recognize eclipses in YPAV SUMBAR disabled children. The results of the study explain that the use of learning videos can be effective for improving children's ability to recognize eclipses in children with disabilities which can be seen from graphs and data analysis techniques in conditions and between conditions. In the A1 baseline condition, it was carried out 4 times until the results increased and stabilized. In condition B, the intervention was carried out 5 times until the results improved and continued to increase. In the A2 baseline condition, the intervention was carried out three times and the results were stable and identical. The conclusion of the proposal is that teachers can provide learning by using

learning video media to support the process of teaching and learning..

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Author Profile

Curup 23 June 2001, Special Education

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