International Journal of Sustainable Applied Sciences (IJSAS)
Vol.2, No.9, 2024: 913-922

The Influence of Using Visme-Based Presentation Media on Science Learning Outcomes of Eighth Grade Students at SMP Negeri 1 Watang Pulu

Muhammad Idris[1*], Muhammad Takdir[2], Usman M[3], Syamsunir[4]
Universitas Muhammadiyah Sidenreng Rappang
Corresponding Author: Muhammad Idris idris25432@gmail.com

A R T I C L E I N F O

Keywords: Visme-based Media, Learning Outcomes, Science Learning

Received : 03, August
Revised : 18, August
Accepted: 25, September

A B S T R A C T

This research utilizes a quantitative method with an experimental design to examine the impact of using Visme-based presentation media on the science learning outcomes of Grade VIII students at SMP Negeri 1 Watang Pulu. The population consists of all Grade VIII students at SMP Negeri 1 Watang Pulu, and the sample includes students from classes VIII.F and VIII.G. The study focuses on two variables: the independent variable is the use of Visme-based presentation media (X), and the dependent variable is the students' learning outcomes (Y). Data were collected through documentation and tests, and then analyzed using the mean formula. The results showed that the value of X = 8579 is greater than Y = 792, indicating a positive effect of Visme-based presentation media on the science learning outcomes of Grade VIII students. The conclusion is that the hypothesis stating there is an effect of using Visme-based presentation media on students' science learning outcomes is accepted

DOI: https://doi.org/10.59890/ma3qdj22
ISN-E: 3025-5597
https://journal.multitechpublisher.com/index.php/ijsas

INTRODUCTION

Education plays a crucial role in shaping both the intellectual and moral development of students. As Sujana (2019) suggests, education helps individuals transition from their natural state to a more civilized and humane existence. The process of education is often reflected in simple examples like teaching children to behave politely, to respect elders, and to care for others. As Prophet Muhammad (PBUH) said, “Seeking knowledge is obligatory upon every Muslim” (Hadith by Ibn Majah).Throughout history, the primary goals of education have been to foster both intellectual abilities and moral values (Sudrajat, 2011). In Indonesia, this is further emphasized by the National Education Law No. 20 of 2003, which states that education serves to develop students’ potential to become faithful, knowledgeable, capable, creative, independent, and responsible individuals.

In today’s world, education is influenced by the rapid advancement of technology, especially in the context of the Fourth Industrial Revolution, commonly known as Education 4.0. This era is characterized by the use of digital technologies in the learning process, making education more flexible and accessible (Mursid & Yulia, 2019). To ensure students are well-prepared for this technological era, educational media must be updated to align with technological developments, thereby improving the learning process.Technology, in its broad sense, is a tool for utilizing natural resources to meet human needs. In the education sector, technology enhances the quality of learning, making it more efficient and engaging (Budiman, 2017). Edgar Dale's "Cone of Experience" theory illustrates the importance of utilizing concrete media in education, as it helps students better absorb abstract concepts through interactive and sensory experiences (Syamsidar et al., 2018).Presentation media is an essential tool in the modern classroom. It allows teachers to present information in a more engaging and interactive manner, thus enhancing students' understanding. Among the various multimedia platforms available, Visme has emerged as a popular tool for creating visually appealing presentations, infographics, and reports. Since its launch in 2013, Visme has evolved into a comprehensive graphic design platform, widely used in education and business sectors (Dengue et al., 2013).In traditional classroom settings, teachers often rely on lecture-based methods, where students passively listen and absorb information. However, this approach can result in disengagement and lower retention of knowledge. Introducing interactive media, such as Visme-based presentations, can enhance students’ learning experiences and improve their outcomes. Visme offers a user-friendly interface, allowing teachers to create dynamic and visually appealing content that captures students' attention and facilitates deeper understanding.

This research explores the impact of using Visme-based presentation media on the science learning outcomes of Grade VIII students at SMP Negeri 1 Watang Pulu. By incorporating digital media into the classroom, this study aims to determine whether there is a significant improvement in students’ academic performance compared to traditional teaching methods.The main question addressed in this study is: Does the use of Visme-based presentation

media have an impact on the science learning outcomes of Grade VIII students at SMP Negeri 1 Watang Pulu?.The objective of this study is to examine the effect of using Visme-based presentation media on the science learning outcomes of Grade VIII students at SMP Negeri 1 Watang Pulu.The findings from this study can contribute to educational theory and practice, particularly in terms of integrating digital media into the learning process. For students, it may enhance engagement and academic performance, while for teachers, it provides insights into effective teaching strategies. Furthermore, it could serve as a reference for schools to adopt digital media to improve the quality of education.

LITERATURE REVIEW

According to the Kamus Besar Bahasa Indonesia (KBBI), influence refers to the power that arises from something (a person, object) that shapes one's behavior, beliefs, or actions. Istiani and Islamy (2020) define influence as a force that can shape or alter something else. From these definitions, it can be concluded that influence refers to the effect or impact of an event or action on people, groups, or the surrounding environment. Influence can be positive or negative, depending on the context and perspective.Presentation media is defined as the tools or systems used to convey information from a source to a receiver. Rais (2015) describes a presentation as a "show" or display designed to capture and focus an audience's attention. According to Marjuni and Harun (2019), presentation media refers to tools such as text, graphics, animations, audio, and video that are used interactively to make presentations more engaging and effective.Hofstetter (2001) further explains that presentation media involves utilizing computers to combine text, graphics, audio, and moving images, enabling users to interact, navigate, and communicate. From these definitions, it can be concluded that presentation media is a form of communication that aids the presentation of information, making it easier for students to understand the material being taught.

Using presentation media in the teaching and learning process enhances the effectiveness and efficiency of knowledge transfer. As Marjuni and Harun (2019) suggest, it helps make lessons more interactive, attractive, and easier for students to follow. Furthermore, it can improve students' engagement and interest, ultimately leading to better academic outcomes.Visme is a web-based infographic and presentation tool that allows users to create interactive presentations, infographics, and other visual content. Launched in 2013 by the American company Easy WebContent, Visme has grown to become a widely used platform in business, education, and marketing (Dengue et al., 2013). Initially developed as an online presentation tool, it has since evolved into a comprehensive platform for designing visual content.Visme provides users with thousands of templates and customizable icons, enabling the creation of professional designs without advanced skills. It supports a wide range of visual elements, including text, graphics, charts, and animations, making it a versatile tool for educators to enhance the learning experience.

Several studies have demonstrated the positive impact of using Visme in educational settings. Agam (2021) explored the effectiveness of the Team Games Tournament (TGT) teaching method using Visme in improving student motivation and learning outcomes in Al-Qur'an and Hadith subjects. The study found that Visme helped enhance student engagement and performance in class.Similarly, Guspriadi and Suhaili (2021) examined the effectiveness of blended learning using Visme as a presentation tool to improve students' digital literacy during the COVID-19 pandemic. Their quasi-experimental study demonstrated that using interactive media such as Visme significantly increased students' understanding and engagement with digital literacy.Cognitive learning outcomes relate to students' knowledge and understanding. According to Sudjana (1992), learning outcomes are the abilities that students possess after receiving educational experiences. Fadhil (2014) defines learning as a process that leads to relatively stable changes in behavior, which can manifest as knowledge, skills, or attitudes.Cognitive outcomes can be assessed by evaluating students' abilities to recall, comprehend, apply, analyze, evaluate, and create. The use of interactive presentation media like Visme can positively affect these cognitive processes by making abstract concepts more tangible and easier to understand.

Affective outcomes refer to students' feelings, attitudes, and values, which play an important role in the learning process. Affective learning involves the development of empathy, respect, and social responsibility. Media such as Visme can support affective learning by making lessons more relatable and engaging, thereby promoting a positive emotional connection to the subject matter.Psychomotor outcomes relate to physical or motor skills. In an educational setting, psychomotor outcomes can involve tasks such as writing, speaking clearly, or engaging in physical activities. Presentation media like Visme can indirectly influence psychomotor skills by fostering a more engaging and hands-on learning environment, where students can actively participate in the lesson.Learning outcomes can be influenced by various internal and external factors. Internal factors include the student's health, motivation, and psychological condition, while external factors may involve the learning environment, family support, and available learning resources. The introduction of Visme as a learning tool addresses some of these external factors by improving the quality of instructional delivery and increasing student engagement.

METHODOLOGY

This study uses a quantitative research method with an experimental design to examine the effect of using Visme-based presentation media on the science learning outcomes of Grade VIII students at SMP Negeri 1 Watang Pulu. According to Sugiyono (2018), quantitative research involves numerical data and uses statistical analysis to reach conclusions. The specific design employed in this study is the posttest-only control group design, a type of true experimental research.In this design, students are divided into two groups:The experimental group, which receives the treatment (Visme-based presentations

during science lessons), and The control group, which undergoes traditional learning without the use of Visme media.Both groups are tested at the end of the intervention to compare their performance and determine the impact of Visme-based media.

This study uses two primary variables:

1. Independent variable (X): The use of Visme-based presentation media during the science lessons for the experimental group.
2. Dependent variable (Y): The science learning outcomes of Grade VIII students, measured through a posttest administered to both the experimental and control groups.

The population for this study includes all Grade VIII students of SMP Negeri 1 Watang Pulu. There are seven classes, labeled VIII.A through VIII.G, comprising a total of 196 students.

For sampling, a random sampling technique was used. Random sampling ensures that all members of the population have an equal chance of being selected for the sample. The sample chosen for this study consists of students from two classes:

1. Class VIII.F (experimental group): 29 students.
2. Class VIII.G (control group): 30 students.

The data collection in this study involves two main methods:

a. Documentation: Information about the school's profile, infrastructure, class conditions, and the number of students was obtained from school records. This data helps contextualize the research environment and provide background for the analysis.
b. Tests: A posttest was administered to measure students' learning outcomes after the intervention. The test consists of 25 multiple-choice questions related to the science material covered during the lessons. The test was given to both the experimental and control groups to assess their understanding of the subject.

The data obtained from the posttest were analyzed using statistical techniques to determine whether there was a significant difference between the two groups. The mean (average) scores of both the experimental and control groups were calculated and compared. The formula used for calculating the mean is:

The mean scores for both groups were then compared to determine whether the use of Visme-based presentation media had a significant impact on the students' learning outcomes. A higher mean score for the experimental group compared to the control group would suggest that the Visme-based media positively affected student learning.

RESULTS AND DISCUSSION

This research was conducted in two classes: the experimental group (Class VIII.F) and the control group (Class VIII.G) at SMP Negeri 1 Watang Pulu. The experimental group was taught using Visme-based presentation media, while the control group followed conventional teaching methods without the use of Visme. After the intervention, both groups were given a

posttest to assess their learning outcomes.The posttest results were analyzed to determine the effect of using Visme-based presentation media on the science learning outcomes. The scores of the experimental group (using Visme) and the control group (traditional method) were recorded and presented in the following tables:

Table 1. Scores of the Experimental Group

No	Code	Score	Grade
1	A	19	76
2	AMW	23	92
3	ASB	21	84
...	...	...	...
29	ZA	23	92

The highest score in the experimental group was 96, and the lowest was 72.

Table 2. Scores of the Control Group

No	Code	Score	Grade
1	AZR	22	88
2	AK	19	76
3	A	21	84
...	...	...	...
30	M	21	84

In the control group, the highest score was 92, and the lowest was 64.

Table 3. Comparison of Mean Scores

Group	Mean Score
Experimental	85.79
Control	79.2

The average score of the experimental group was 85.79, while the control group had an average score of 79.2. The data indicate a clear difference between the two groups, with the experimental group scoring higher on average than the control group.

DISCUSSION

The purpose of this study was to determine whether the use of Visme-based presentation media has a positive impact on the science learning outcomes of Grade VIII students at SMP Negeri 1 Watang Pulu. Based on the results, it is evident that students in the experimental group, who were taught using Visme-based media, outperformed those in the control group, who were taught using traditional methods.The higher mean score of the experimental group (85.79) compared to the control group (79.2) suggests that the use of interactive media like Visme enhances students' understanding of the material. These findings are consistent with previous studies, such as Agam (2021), who found that using Visme and other interactive tools in the classroom significantly improved students' engagement and academic performance.

The difference in performance between the two groups can be attributed to several factors:

1. Visual Engagement: Visme offers a variety of interactive elements such as graphics, animations, and infographics, which make the learning process more engaging and easier for students to understand. According to Budiman (2017), interactive media helps bridge the gap between abstract concepts and practical understanding, making it easier for students to grasp complex subjects like science.
2. Active Participation: Students in the experimental group were more actively involved in the learning process compared to those in the control group. This aligns with Edgar Dale's "Cone of Experience" theory, which emphasizes the importance of hands-on, interactive experiences in learning (Syamsidar et al., 2018). Visme-based presentations encouraged students to participate actively, leading to better retention of knowledge.
3. Enhanced Attention and Focus: Visme's multimedia features, including animations and videos, captured the students' attention and maintained their focus throughout the lessons. This improved focus likely contributed to the better performance of the experimental group, as noted by Mursid & Yulia (2019), who highlighted that digital media can create a more immersive learning experience.
4. Improved Motivation: The interactive nature of Visme presentations also had a positive effect on student motivation. Students were more eager to engage with the material, as they found the lessons more interesting compared to traditional lectures. This supports Guspriadi and Suhaili's (2021) findings, where the use of Visme in blended learning environments enhanced student motivation and digital literacy.

CONCLUSIONS AND RECOMMENDATIONS

Based on the results of the study examining the effect of using Visme-based presentation media on the science learning outcomes of Grade VIII students at SMP Negeri 1 Watang Pulu, several conclusions can be drawn:Positive Impact of Visme-Based Media on Learning Outcomes: The use of Visme-based presentation media significantly improves the science learning outcomes of students. The experimental group, which used Visme during lessons, achieved a higher average score (85.79) compared to the control group, which used traditional teaching methods (79.2). This indicates that Visme media is an effective tool for enhancing students' understanding and retention of science material.Increased Student Engagement: The interactive nature of Visme-based presentations led to increased student participation and engagement in the learning process. Visme's use of visual elements such as animations, infographics, and dynamic slides made the lessons more interesting and relatable for students, resulting in better focus and higher motivation to learn.Support for Digital Media Integration in Education: The findings of this research support the integration of digital media like Visme into the educational process. As demonstrated, the use of multimedia tools in the classroom helps create a more dynamic and engaging learning environment,

making it easier for students to absorb complex concepts. This aligns with current educational trends towards adopting digital technologies to improve learning outcomes in the era of Education 4.0.Recommendation for Future Use: Teachers are encouraged to utilize Visme or similar multimedia presentation tools in their teaching practices to enhance students' learning experiences. The findings suggest that students who engage with interactive media perform better academically, indicating the potential for broader application of these tools across various subjects.

FURTHER STUDY

This research still has limitations so further research needs to be done on the topic "The Influence of Using Visme-Based Presentation Media on Science Learning Outcomes of Eighth Grade Students."

REFERENCES

Agam, A. (2021). Efektivitas Metode Pembelajaran Team Games Tournament dengan Media Visme untuk Meningkatkan Motivasi dan Hasil Belajar Al-Qur'an dan Hadits pada Siswa Kelas III A MI Nurul Huda Bengkulu. Jurnal An-Nizom, 2(6), 127–137.

Budiman, H. (2017). Peran Teknologi Informasi dan Komunikasi dalam Pendidikan. Al-Tadzkiyyah: Jurnal Pendidikan Islam, 8(1), 31–42. https://doi.org/10.24042/atjpi.v8i1.2095

Coring, F. B. (2019). Pengaruh Penggunaan Multimedia terhadap Hasil Belajar Siswa Kelas IV pada Mata Pelajaran Bahasa Inggris Kurikulum Cambridge di Sekolah Dasar Khadijah Surabaya. Jurnal Pendidikan, 8–19.

Dale, E. (1969). Audio-Visual Methods in Teaching. Holt, Rinehart, and Winston.

Dengue, B. Di D. B. D., & Utara, S. (2013). Penggunaan Media Visme dalam Peningkatan Hasil Belajar Siswa. Jurnal Pendidikan, XXVI(1), 1–6.

Fadhil, A. (2014). Penerapan Metode Ceramah dan Diskusi dalam

Meningkatkan Hasil Belajar PAI di SMA Negeri 44 Jakarta. Jurnal Studi Al Qur'an, 10(2), 121–130.

Fajar, S. (2017). Pengaruh Penggunaan Media Powtoon terhadap Hasil Belajar Siswa pada Mata Pelajaran Ilmu Pengetahuan Sosial Terpadu. Jurnal Pengajaran MIPA, 3(2), 101–114. http://ejournal.upi.edu/index.php/edutechnologia/article/view/8957

Ghozali, I. (2017). Metodologi Penelitian: Metodologi Penelitian Skripsi. Rake Sarasin.

Guspriadi, Y., & Suhaili, N. (2021). Pelaksanaan Layanan Informasi dengan Metode Blended Learning dan Presentation Tools Visme untuk Meningkatkan Pemahaman Literasi Digital Peserta Didik. Jurnal Pendidikan, 44–51.

Hofstetter, F. T. (2001). Multimedia Literacy. McGraw-Hill.

Istiani, N., & Islamy, A. (2020). Fikih Media Sosial di Indonesia. Asy Syar'iyyah: Jurnal Ilmu Syari'ah dan Perbankan Islam, 5(2), 202–225. https://doi.org/10.32923/asy.v5i2.1586

Marjuni, A., & Harun, H. (2019). Pengaruh Penggunaan Media Presentasi Berbasis Visme Terhadap Hasil Belajar Siswa. Jurnal Teknologi Pendidikan, III(2), 194–204.

Mursid, R., & Yulia, E. (2019). Pengembangan Pembelajaran dalam Teknologi Pendidikan di Era RI 4.0. Prosiding Seminar Nasional Teknologi Pendidikan, 35–42.

Muthoharoh, M. (2019). Media PowerPoint dalam Pembelajaran. Tasyri: Jurnal

Tarbiyah-Syariah-Islamiyah, 26(1), 21–32.

Rais, M. (2015). Pengaruh Penggunaan Multimedia Presentasi Berbasis Prezi dan Gaya Belajar terhadap Kemampuan Mengingat Konsep. Jurnal Mekom, 2(1), 10–24.

Sari, W. S., Dewi, I. N., & Setiawan, A. (2012). Berbasis Augmented Reality untuk Pengenalan Pancaindra dalam Mendukung Mata Pelajaran IPA Tingkat Sekolah Dasar. Jurnal Semantik, 24–29.

Sudjana, N. (1992). Metode Statistik. Tarsito.

Sudrajat, A. (2011). Mengapa Pendidikan Karakter?. Jurnal Pendidikan Karakter, 1(1), 47–58. https://doi.org/10.21831/jpk.v1i1.1316

Sugiyono. (2018). Metode Penelitian Kuantitatif, Kualitatif, dan R&D. Alfabeta.

Syamsidar, M., Maruf, U. M. M., & Hustim, R. (2018). Pembelajaran Fisika Berbasis Cone of Experience Edgar Dale. Jurnal Pendidikan Fisika, 6(1), 1–12.