

THE EFFECTIVENESS OF THE APPLICATION OF TEACHMINT LEARNING MEDIA BASED ON THE SAVI LEARNING MODEL TO IMPROVING IPAS LEARNING OUTCOMES

Yulsy Nitte¹, Kristina E Noya Nahak², Cornelia A. Naitili³, Elsy Modok⁴
^{1,2,3,4} *Elementary School Teacher Education Study Program,*
Citra Bangsa University, Indonesia
yulsynitte9@gmail.com¹, kristina.noya.nahak@gmail.com²,
amandacornelia793@gmail.com³, modokelsha@gmail.com⁴

ABSTRACT

The aim of this research was to determine the effectiveness of utilizing Teachmint media integrated with the SAVI learning model in improving Integrated Science and Social Studies (IPAS) learning outcomes among fifth-grade students of SD GMIT Oepura, Kupang City. This research employed a quantitative approach with a Quasi-Experimental design. The sample was selected using a purposive sampling technique, consisting two classes: Class V-A as the experimental group and Class V-B as the control group. The data collection technique consisted of a test comprising 20 multiple-choice questions. The application of the Direct Instruction model with a lecture method in the control class resulted in an average pre-test score of 50.48 and a post-test score of 62.62, indicating an improvement of 12.14 points. Meanwhile, the SAVI learning model supported by Teachmint media in the experimental class achieved an average pre-test score of 55.24, which increased to a post-test score of 87.86, reflecting an improvement of 32.62 points. The research findings were reinforced by hypothesis testing and t-test analysis of the post-test scores from both the control and experimental groups. The Independent Sample Test produced a significance value (2-tailed) for the t-test for Equality of Means of 0.000, which is less than the threshold of 0.05. This result confirms the acceptance of the alternative hypothesis (H_a), indicating a significant effect of the SAVI model supported by Teachmint media on IPAS learning outcomes, particularly for the theme "Getting Acquainted with Our Earth," among fifth-grade students of SD GMIT Oepura, Kupang City.

Keywords: Teachmint, SAVI, Learning Outcomes, IPAS.

I. INTRODUCTION

The teaching and learning process is an interaction activity between students and teachers that requires supporting components, namely the existence of goals to be achieved, the existence of methods to achieve these goals. The learning process in the current digital era has undergone significant changes along with the development of information technology.

One of the innovations in the field of education is the use of technology as an interactive and flexible learning medium. Online learning platforms such as teachmint have become an attractive alternative to integrate into the learning process, especially in an effort to increase student engagement and facilitate more effective learning. Facing the development of information technology, an educator is required to master several skills known as the 6Cs, namely 1) Citizenship; 2) Character; 3) Critical thinking and problem solving; 4) Creative; 5) Communication; and 6) Collaboration, (Afif et al 2021). In addition to the above aspects of skills that need to be considered are character values, the purpose of this character value is to form an individual's identity, which in this case will show how the integration of a person's personality such as the value of beliefs, attitudes and principles possessed by the individual. The character values contained in a tradition will form the positive values that an individual uses to live in a thriving society in a school environment that is closely related to lifelong learning (Nitte 2024: 172)

Designing interesting and effective learning, in addition to the use of interactive learning media, one of the most important roles is the learning model. The SAVI (Somatic, Auditory, Visual, Intellectual) learning model is an approach that integrates four main elements in the learning process: physical (somatic), auditory (auditory), visual (visual), and intellectual (Subekti et al. 2019:172). This model is designed to maximize students' potential by involving various learning styles so that they can improve overall learning outcomes. The application of the SAVI model is considered appropriate for the subject of Natural and Social Knowledge (IPAS), which requires an in-depth understanding of concepts through various holistic learning approaches.

In the context of learning at SD GMIT Oepura, Kupang City, there are still challenges in maximizing the use of technology as a learning medium. There are still teachers and students who have not been able to adapt to these changes, especially in utilizing digital media such as technology-based teachmint. In addition, learning social sciences that has a wide scope of material is often considered difficult for students, so a more effective learning method is needed. Furthermore, It was found that teachers do not implement a variety of learning models in their instructional activities.

The learning is still teacher-centered with a lecture method so that it does not produce creative and fun learning. Teachers have not maximized the use of teaching media in teaching, especially technology-based media, only giving explanations in front of the class

and writing on the whiteboard based on the material in the IPAS books. This causes a lack of student interest in learning because students are not actively involved in learning activities, which has an impact on declining grades. This is also evident from the learning results of the pre-test of the control class, which is as many as 21 students uncompleted the KKTP

Based on this background, the objective of this research is to analyze the effectiveness of utilizing Teachmint learning media integrated with the SAVI learning model in improving IPAS learning outcomes among fifth-grade students at SD GMT Oepura, Kupang City. Through this research, it is anticipated that empirical evidence will be gathered to evaluate the effectiveness of the combination of Teachmint and the SAVI model in enhancing students' IPAS learning outcomes, as well as to provide recommendations for teachers on implementing this method in daily instruction.

II. LITERATURE REVIEW

1. SAVI Learning Model

SAVI stands for Somatic, Auditic, Visual and Intellectual. The Somatic Learning Approach of Intellectual Visual Auditory (SAVI) is supported by the theory of Accelerated Learning, left-brain theory and right-brain theory, multiple intelligence theory and holistic (comprehensive) education. According to Dave Meier (Astuti, 2003: 54) the Somatic Visual Intelligence (SAVI) approach to learning adheres to several main principles of the Accelerated Learning theory, namely (1) Learning involves the whole mind and body, (2) Learning is creating, not consuming, (3) Cooperation helps the learning process, (4) Learning takes place at many simultaneous levels, (5) Learning comes from doing the work itself (with feedback) (6) Positive emotions are very helpful learning and (7) The image brain absorbs information directly and automatically.

SAVI learning model is learning that emphasizes that learning must utilize all the sensory tools that students have. SAVI is short for; Somatic body movements (hands on, physical activity) where the way of learning by experiencing and doing, auditory which means learning must be through listening, listening, speaking, presentation, argumentation, responding. Visual means learning must use the senses of the eye through observing, drawing, demonstrating, reading, using media and props. And intellectual which means learning must be by using the ability to think (minds-on), learning must be by concentrating the mind practicing using it through

reasoning, investigating, identifying, finding, creating, constructing, solving problems and applying (Suyatno 2009:65)

2. Teachmint

Teachmint is one of the latest mobile apps for educators, and training institutions. This application has a Learning Management system (LMS) feature that allows simple communication between teachers and students both inside and outside the classroom. Teachmint can also help with quizzes or tests, various homework and subject matter, communication with students, can also conduct online classes by recording classes, teaching with a whiteboard, monitoring attendance, performance and more.

Teachmint serves as a learning medium that allows educators to effectively manage classes in virtual spaces. Teachmint integrates a variety of tools that make teaching easier, including features for video conferencing, assessment, and sharing of teaching materials. This platform is very useful in the context of blended learning and online learning. In essence, Teachmint is not a stand-alone learning model, but rather is more accurately categorized as a tool or platform that supports more traditional and modern learning models. The platform is designed to facilitate interaction between teachers and students in a digital learning environment, allowing for more interactive and structured teaching.

3. Learning Outcomes

Learning outcomes are characterized by behavioral changes. Nevertheless, not all behavior changes are learning outcomes, learning activities are generally accompanied by behavioral changes. Changes in behavior in most things are observable changes. However, it is also not always possible to observe the change in behavior intended as a learning outcome. The changes that can be observed are mostly related to changes in motor aspects. Behavior changes as learning outcomes can also touch changes in affective aspects, including changes in emotional aspects (Harefa et al 2024:6)

III. METHODOLOGY

1. Type and Design of Research This type of research is a quasi-experimental quantitative research using the purposive sampling technique
2. Population and Sample

The population and samples in this study are students of class VA as an experimental class of 21 students with the application of the SAVI model assisted by teachmint media and class VB as a control class of 21 students with Direct Instruction learning of the lecture method.

3. Research Instruments Using test studies in the form of pre test and post test with the form of test used is an objective test (multiple choice) as many as 20 questions with four answer choices in each question. Another instrument used in this study is the documentation study

4. Research Procedure

Data collection is carried out in several stages. First, students in both groups were given a pre-test to measure their initial ability in science and science subjects with the theme of getting acquainted with our earth. Second, for one week, the experimental group received IPAS learning using the Teachmint-assisted SAVI model, while the control group received Direct Instruction learning using the lecture method. After the intervention period ended, students in both groups were given the same post-test to measure changes in student learning outcomes. Data from the achievement test were collected and analyzed to determine if there was a significant difference in achievement between the two groups.

5. Analysis of research data

Data collected from the initial test (pre-test) and final test (post-test) were analyzed using SPSS software. The following analyses are performed: a) Normality Test: This test is used to determine if the distributed data is normal, ensuring that the data meets the assumptions necessary for further statistical analysis. b) Homogeneity Test: A homogeneity test is performed to assess whether the variance between the experimental group and the control group is similar. c) T-Test Independent Samples Test: The paired sample T-test was conducted to compare the average scores of the initial test (pre-test) and the final test (post-test) in both experimental and control groups. This test was used to determine whether there was a statistically significant difference in learning outcomes between the two groups.

IV. RESULTS

This research began by providing an initial test or pre-test of 20 questions to both classes. It showing there was a difference in the value of students' initial problem-solving skills that was not too significant in the control class and the experimental class before

being given treatment. In detail, the results of the pre-test are presented according the table down below:

Table 1 Results of Pre-Test and Post-Test of Experimenter and Control Classes

| Group | Pre test (Mean) | Post test (Mean) | Difference (Mean) |
|------------|-----------------|------------------|-------------------|
| Experiment | 55,24 | 87,86 | 32,62 |
| Control | 50,48 | 62,62 | 12,14 |

Based on the table above, the number of pre test and post test students in the experimental class was 21 students with zero missing. From the calculation of the table above, the average score of pre-test learning outcomes in the control class was 55.24 while the average score of the post test in the control class was 87.86. There was a difference in scores of only 32.62 while in the control class the number of pretest and post test students in the control class was 21 students with zero missing. From the calculation of the table above, the average score of pre-test learning outcomes in the control class was 50.48 while the average score of the post test in the control class was 62.62. There is a difference of only 12.14 values. The data is strengthened by the frequency distribution of pre test and post test results in the control class it is apparent in the table below:

Table 2. Distribution Pre test Control Class

| Pre test Control | | | | | Post test Control | | | | |
|------------------|---------------|-------------|----------------------|---------------------------|-------------------|---------------|-------------|------------------|---------------------------|
| | Freque ncy | Perce nt | Valid Perce nt | Cumulati ve Percent | | Freque ncy | Perce nt | Valid Percent | Cumulati ve Percent |
| Valid | 35 | 2 | 9.5 | 9.5 | Valid | 45 | 1 | 4.8 | 4.8 |
| | 40 | 1 | 4.8 | 4.8 | | 50 | 2 | 9.5 | 9.5 |
| | 45 | 4 | 19.0 | 19.0 | | 55 | 2 | 9.5 | 9.5 |
| | 50 | 6 | 28.6 | 28.6 | | 60 | 6 | 28.6 | 28.6 |
| | 55 | 3 | 14.3 | 14.3 | | 65 | 4 | 19.0 | 19.0 |
| | 60 | 4 | 19.0 | 19.0 | | 70 | 2 | 9.5 | 9.5 |
| | 65 | 1 | 4.8 | 4.8 | | 75 | 4 | 19.0 | 19.0 |
| Tot al | 21 | 100. | 100.0 | | To tal | 21 | 100.0 | 100.0 | |

From the pre-test distribution data of the control class above, for the control class of 21 students, there were no students who met the KKTP. Meanwhile, in the data on the results of the posttest in the control class after being given conventional learning treatment / Direct Instruction lecture method, 6 students (28%) met the KKTP score of 70 and the remaining 15 students (71%) did not meet the KKTP. Based on the two tables

above, concluded that there is a difference between pre test and post test in the control class, previously given the treatment of student learning outcomes, pre test, there are no students who meet the KKTP, then given conventional learning treatment/Direct Instruction lecture method, there are only 6 students who qualified the KKTP The frequency distribution of pre test and post test results in the experimental class it is apparent in the table below:

Table 4. Distribution of Pre-test Experimental Classes

| Pre test Experiment | | | | | Post test Experiment | | | | |
|---------------------|------|---------|---------|------------|----------------------|-------|--------|---------|------------|
| | Freq | Percent | Valid | Cumulative | | Frequ | Percen | Valid | Cumulative |
| | uenc | | Percent | Percent | | ency | t | Percent | Percent |
| Valid | 40 | 1 | 4.8 | 4.8 | Valid | 75 | 1 | 4.8 | 4.8 |
| | 45 | 4 | 19.0 | 19.0 | | 80 | 3 | 14.3 | 19.0 |
| | 50 | 3 | 14.3 | 14.3 | | 85 | 7 | 33.3 | 52.4 |
| | 55 | 3 | 14.3 | 14.3 | | 90 | 4 | 19.0 | 71.4 |
| | 60 | 6 | 28.6 | 28.6 | | 95 | 5 | 23.8 | 95.2 |
| | 65 | 3 | 14.3 | 14.3 | | 100 | 1 | 4.8 | 100.0 |
| | 70 | 1 | 4.8 | 4.8 | | Total | 21 | 100. | 100.0 |
| | | | | | | | | | 0 |
| Total | 21 | 100. | 100.0 | | | | | | |

According the table above of learning results of the pre-test experiment, there was 1 student (5%) who qualified the KKTP and the remaining 20 students (95%) unqualified the KKTP in learning IPAS. From the experimental class post test table, it was proved that the students' scores after being treated using the application of the SAVI model assisted by teachmint media, qualified or achieved a minimum KKTP of 70 as many as 21 students (100%). Moreover, the results of this study are strengthened by the results of the prerequisite tests:

Table 5. Normality Test Results

| | | Test of Normality | | | | | |
|--------------------------|----------------------|---------------------------------|----|-------|--------------|----|------|
| classes | | Kolmogorov-Smirnov ^a | | | Shapiro-Wilk | | |
| | | Statistic | df | sig. | Statistic | df | sig. |
| Learning outcomes | Pre test experiment | .193 | 21 | .039 | .941 | 21 | .231 |
| | Post test experiment | .195 | 21 | .036 | .939 | 21 | .210 |
| | Pre test control | .144 | 21 | .200* | .948 | 21 | .314 |
| | Post test control | .144 | 21 | .200* | .938 | 21 | .199 |

Based on the results of the normality test above, the significance value of the Shapiro-Wilk test of 0.210 in the experimental post test class and 0.199 in the control post test class

has a significance value greater than 0.05 it showing that the data is normally distributed.

Table 6 Homogeneity Test Results

| Test of homogeneity of Variance | | | | | |
|---------------------------------|------------------------------------|------------------|-----|--------|------|
| | | Levene statistic | df1 | df2 | sig. |
| Learning outcomes | Based on mean | 1.609 | 1 | 40 | .212 |
| | Based on median | 1.063 | 1 | 40 | .309 |
| | Based on median and with adjust df | 1.063 | 1 | 38.027 | .309 |
| | Based on trimmed mean | 1.637 | 1 | 40 | .208 |

According to the table above, the data is homogeneous due to significance is > 0.05.

Table 7 T-Test Independent Samples Test Results

| | | Levene's Test for Equality of Variances | | t-test for Equality of Means | | | | | | |
|---------------------------|-----------------------------|---|------|------------------------------|--------|-----------------|-----------------|---------------------|---|----------|
| | | F | Sig. | t | Df | Sig. (2-tailed) | Mean Difference | Std. Error Diffence | 95% Confidence Interval of the Difference | |
| | | | | | | | | | Lower | Upper |
| Model Pembelajaran | Equal variances assumed | 1.609 | .212 | 10.648 | 40 | .000 | 25.23810 | 2.37021 | 20.44771 | 30.02848 |
| | Equal Variances not assumed | | | 10.648 | 36,744 | .000 | 25.23810 | 2.37021 | 20.43446 | 30.04173 |

According to the table 7, it is found that the significance value (2-tailed) is 0.000 or less than 0.05, it showed H0 is rejected or there is a significant influence on the use of teachmint learning media based on the SAVI learning model in improving the learning outcomes of science and science on the theme of getting acquainted with our earth in grade V students of SD GMIT Oepura, Kupang City.

V. DISCUSSION

Based on the research findings above, the learning outcomes of the two classes differed due to variations in the teaching approach. The control class was taught using the conventional method/Direct Instruction with a lecture-based approach, whereas the experimental class received instruction through the implementation of the SAVI model aided by the Teachmint media. The pre-test and post-test results indicate a significant improvement in the experimental class, with an average score of 87.86 compared to the control class, which achieved an average score of 62.62. This demonstrates that

employing creative and engaging teaching models can enhance students' learning interest, ultimately leading to improved learning outcomes. Specifically, in the fifth-grade students of SD GMIT Oepura, there was a significant increase in learning outcomes. In the control class post-test, only 6 students (28%) achieved the minimum competency criteria (KKTP), whereas in the experimental class post-test, all 21 students (100%) achieved the KKTP.

In learning activities with the SAVI model, known argued student's actively participate in learning activities. In somatic activities, do examples of activities related to getting acquainted with our earth, then in the auditory aspect, students listen and listen to the teacher's explanations well. In the question and answer activity, most students can also throw their opinions. Then on the visual aspect of each group paying attention to each other and observing each other, students also perceived examples practiced by the teacher. The latest, the intellectual aspect students consistently engage their cognitive abilities throughout the learning process. During all stages of learning, students actively develop their critical thinking skills to solve the problems presented. They are encouraged to ask questions and express their opinions regarding the given issues questions and give their opinions on the given issues.

VI. CONCLUSION

The implementation of the Direct Instruction model with a lecture method in the control class resulted in an average pre-test score of 50.48, which increased to an average post-test score of 62.62, reflecting an improvement of 12.14 points. Meanwhile, the application of the SAVI learning model aided by Teachmint media in the experimental class achieved an average pre-test score of 55.24, which significantly increased to a post-test score of 87.86, marking an improvement of 32.62 points. These results indicate a significant impact of the SAVI model aided by Teachmint media on learning outcomes in the Integrated Science and Social Studies (IPAS) subject theme of getting acquainted with our earth for fifth-grade students at SD GMIT Oepura, Kupang City. It is recommended that teachers adopt more interactive and technology-based learning models in their teaching processes to enhance student engagement and achievement.

REFERENCES

- Afif, K., *et al.* (2021). Pengembangan Bahan Ajar Interaktif Bermuatan 6C (Critical Thinking, Creative Thinking, Collaboration, Communication, Character, dan Citizenship) pada Materi Pola Bilangan Kelas VIII. *Jp3*, 16(1), 284–293. Retrieved from <http://www.riset.unisma.ac.id/index.php/jp3/article/view/9830>
- Afifah, *et al.* (2022). Efektivitas Model Pembelajaran SAVI dalam mata Pelajaran IPA di Kelas V Sekolah Dasar. *Jurnal Pendidikan Dasar*. 2(2), h. 211- 219.
- Astuti, Rahmani. (Penerjemah) (2002). *The Accelerated Learning Handbook*. Bandung : Kaifa.
- Harefa, Edward *et al.* 2024. *Buku Ajar Teori Belajar Dan Pembelajaran*. Jambi : Sonpedia Publishing Indonesia
- Nitte, Yulsy. (2024). Kosu and implementation of local wisdom character values in West Amarasi, Indonesia. *The International Journal of Social Sciences World (TIJOSSW)*, 6(1), 170–175. Retrieved from <https://www.growingscholar.org/journal/index.php/TIJOSSW/article/view/445>
- Shoimin A. (2014). *Model Pembelajaran Inovatif dan Kurikulum 2013*. Yogyakarta: Ar-Ruz Media.
- Subekti, S *et al.* (2019). Pengaruh Model Pembelajaran SAVI terhadap Hasil Belajar Siswa. *Jurnal Pendidikan*.
- Sufyadi, *et al.* (2021). *Pembelajaran paradigma baru*. Jakarta: Pusat Asesmen dan Pembelajaran.
- Sugiyono. (2015). *Metode Penelitian Pendidikan, Pendekatan Kuantitatif, Kualitatif dan R&D*. Bandung: Alfabeta.
- Suyatno. 2009. *Menjelajah Pembelajaran Inovatif*. Sidoarjo: Masmedia Buana Pustaka.