



The Effectiveness of Snakes and Ladders as a Learning Media to Increase Students Learning Interest in Pancasila Education at Madrasah Ibtidaiyah

Muhammad Hasan^{1,a*}, Dukan Jauhari Faruq^{2,b}

^{1,2}Universitas Al-Falah As-Sunniah, Jember, East Java, Indonesia

E-mail: 2144260233@inaifas.ac.id^a, djauharifarug@gmail.com^b

Abstract:

Despite the critical role of instructional media in education, its implementation remains suboptimal in many learning environments. This study develops and evaluates a diversity-themed snakes and ladders game as an innovative medium for enhancing student engagement in Pancasila Education among fifth-grade learners at MI Nahrul Muhith. Using the Research and Development (R&D) methodology with the ADDIE framework (Analysis, Design, Development, Implementation, Evaluation), the study involved 16 participants. Data were collected through questionnaires and competency tests. Validation results demonstrated excellent suitability, with media experts rating the product at 88% and content experts at 84%, both meeting "very valid" criteria. Practicality assessments revealed outstanding outcomes: 90% approval in small-group trials, increasing to 93% student approval and 94% teacher approval in large-group implementation. Most significantly, the intervention achieved 100% classical learning mastery, confirming its educational effectiveness. These findings substantiate the game's viability as both a pedagogically sound and engaging instructional tool for character education, particularly in promoting diversity awareness through interactive learning experiences.

Keywords: *Learning Media, Snakes and Ladders, Pancasila Education*

How to cite this article:

Hasan, M., & Faruq, D. J. (2025). The effectiveness of snakes and ladders as a learning media to increase students learning interest in Pancasila education at Madrasah Ibtidaiyah. *Mitra PGMI: Jurnal Kependidikan MI*, 11(2), 163-172. <https://doi.org/10.46963/mpgmi.v11i2.2900>

Article Information

*Corresponding author:

2144260233@inaifas.ac.id

DOI:

<https://doi.org/10.46963/mpgmi.v11i2.2900>

Article History:

Received : 10 / 06 / 2025

Revised : 12 / 07 / 2025

Published : 31 / 07 / 2025

INTRODUCTION

Hasbullah states, "Education is a conscious and planned effort to create a learning atmosphere and learning process in which students actively develop their potential to possess spiritual strength, self-control, personality, intelligence, noble character, and the skills needed for themselves, their community, the nation, and the state." Education has become a fundamental need for every human being. One of the efforts made by humans to improve this process is through education itself. According to Jalil, education is the process of changing the attitudes and behaviors of a person or group of people in an effort to mature individuals through teaching and training. Therefore, proper education is necessary to develop each individual's character and potential. In this way, Indonesia will produce students with strong



potential and character. Education and instruction are highly complex matters, as many factors can influence them. One of the most significant is the teacher. A teacher is expected to provide effective instruction so that students can absorb learning well. As stated in the words of Allah SWT:

أَدْعُ إِلَى سَبِيلِ رَبِّكَ بِالْحُكْمِ وَالْمَوْعِظَةِ الْحَسَنَةِ وَجَادِلْهُمْ بِالَّتِي هِيَ أَحْسَنُ لِنَ رَبِّكَ هُوَ أَعْلَمُ بِمَنْ ضَلَّ عَنْ سَبِيلِهِ وَهُوَ أَعْلَمُ بِالْمُهْتَدِينَ

“Invite (all) to the Way of your Lord with wisdom and good instruction and argue with them in a way that is best. Truly, your Lord is most knowing of who has strayed from His way, and He is most knowing of who is rightly guided.” (Surah An-Nahl: 125).

In the teaching of Pancasila Education, which covers a wide range of topics, it is necessary to use methods that help students understand the material easily. Therefore, there is a need for learning media that is engaging, innovative, easy to use, and accessible for students. Elementary school students are still in the phase of enjoying play and physical activity, as elementary school represents a transitional period from play-based learning to formal education. According to Anggraeni (2023), learning media refers to anything that can convey or deliver messages from a learning source in a planned manner, thus creating a supportive learning environment in which learners can carry out the learning process effectively and efficiently. Hence, media functions as a tool to deliver messages. Learning media can be used to present material in a way that is easier for students to receive and understand. It also helps teachers to convey lessons more effectively so that students can grasp the content more quickly.

In this study, the learning medium used is the “Snakes and Ladders” game. This educational media is adapted from traditional gameplay and adjusted to the characteristics of students, with the aim of serving as an engaging learning tool (Afandi, 2015:80). One of the strengths of the Snakes and Ladders game as a learning medium is that it makes the learning process fun, thus increasing student interest. Students can participate directly in the learning process, and the game supports various aspects of child development.

Based on observations conducted in Class V at MI Nahrul Muhith, it was found that the school had never used instructional media in the learning process. Lessons were still teacher-centered, and the method used was mostly lecture-based, making the learning experience monotonous. It was also observed that many students did not pay attention during Pancasila Education lessons—especially in the topic “The Cultural Diversity of My Indonesia”—due to boredom and lack of engagement.

The Snakes and Ladders game has advantages as an interactive and enjoyable educational medium because it integrates elements of play and learning in a single

activity. This medium has been shown to increase student participation and create a more engaging learning environment. Previous studies have demonstrated the effectiveness of Snakes and Ladders as a learning tool. For example, research by (Aprilianto, 2022) showed that it could improve students' academic performance in social studies. Another study by (Audi, 2024) concluded that it could foster learning motivation and strengthen students' conceptual understanding in thematic subjects. Similarly, (Fitriansyah, 2017) found that educational games like Snakes and Ladders could transform passive classroom environments into more active and collaborative ones. However, no prior studies have specifically developed a culturally diverse version of the Snakes and Ladders game for use in Pancasila Education, particularly for the topic "The Cultural Diversity of My Indonesia." This is where the novelty of this research lies: integrating the values of cultural diversity into an educational game, which has not been widely explored before.

This is important because current classroom practices show that Pancasila Education is still largely teacher-centered, where lecture methods dominate and create a monotonous atmosphere. As a result, students become disinterested and disengaged, particularly in the topic "The Cultural Diversity of My Indonesia." Students appear bored, unenthusiastic, and show minimal participation. Therefore, there is a need for innovative educational media that is not only engaging but also relevant to the values being taught, such as Indonesia's rich cultural diversity.

Based on the above problems—and considering the effectiveness and efficiency of learning tools suited to students' developmental characteristics—the researcher is interested in conducting a study entitled: "The Effectiveness of the Snakes and Ladders Learning Media in Increasing Student Interest in Pancasila Education at Madrasah Ibtidaiyah." The aim of this research is to examine the validity, practicality, and effectiveness of the Snakes and Ladders media for teaching the topic "The Cultural Diversity of My Indonesia" in Class V of Madrasah Ibtidaiyah.

METHOD

The method used in this study is Research and Development (R&D). R&D is a research methodology used to produce specific products and test their effectiveness (Sugiyono, 2016). The data collection techniques in this study were non-test techniques, including interviews, questionnaires, and validation sheets completed by subject matter experts and media experts. The development model chosen for this research is the ADDIE model, which is considered effective and suitable. The ADDIE model consists of five stages: Analysis, Design, Development, Implementation, and Evaluation. The research subjects were fifth-grade students from one Madrasah Ibtidaiyah, selected using purposive sampling.

The selection of subjects was based on the suitability of the material, the students' developmental stage, and the availability of both control and experimental classes.

RESULTS AND DISCUSSION

The development of this snakes and ladders instructional media followed the ADDIE model, which includes five stages: Analysis, Design, Development, Implementation, and Evaluation.

Analysis

In the analysis stage, the researcher conducted a needs analysis, student analysis, and material analysis to identify and classify issues related to the use of instructional media in Pancasila Education at Madrasah Ibtidaiyah (MI). The first analysis needs analysis focused on the lack of innovative instructional media in Grade V, especially for the topic of cultural diversity. Teachers mainly relied on standard textbooks provided by the school and a few visual aids such as images from the internet. Yet, media in the learning process is essential because it stimulates students' thoughts, emotions, attention, and motivation. (Hadi & Gustiana, 2016) explains that instructional media plays a crucial role in achieving learning objectives. It acts as a bridge to deliver information from teacher to student.

The second analysis, student revealed that during Pancasila education classes, some students paid attention to the teacher's explanation, while others did not, choosing instead to chat with seatmates. Students felt bored when lessons were delivered solely through verbal explanation and textbooks without any engaging media. Interviews with the Grade V homeroom teacher also indicated that some students had not yet reached the Minimum Mastery Criteria, pointing to low learning outcomes in Pancasila Education. Therefore, instructional media is needed to support teachers in presenting material in a more interesting way that can improve student engagement and understanding. This aligns with (Gumilar, 2024), who states that students' interest in a subject is key to learning success. When students are interested, they study more seriously, which ultimately improves academic achievement. (Arsyad & Kharisma, 2025) hadi adds that creative and innovative instructional media is essential to capture students' attention and encourage active participation.

The third analysis—content analysis—focused on the Pancasila Education curriculum, specifically Chapter 1: "My Indonesia's Cultural Diversity". This material is crucial as it introduces students to the richness of Indonesian cultures, including traditional clothing, houses, musical instruments, dances, foods, and more. Teaching this content is important to encourage students to preserve Indonesia's cultural heritage.

Based on these analyses, the instructional media selected must align with students' needs and the curriculum. A culturally-themed Snakes and Ladders board

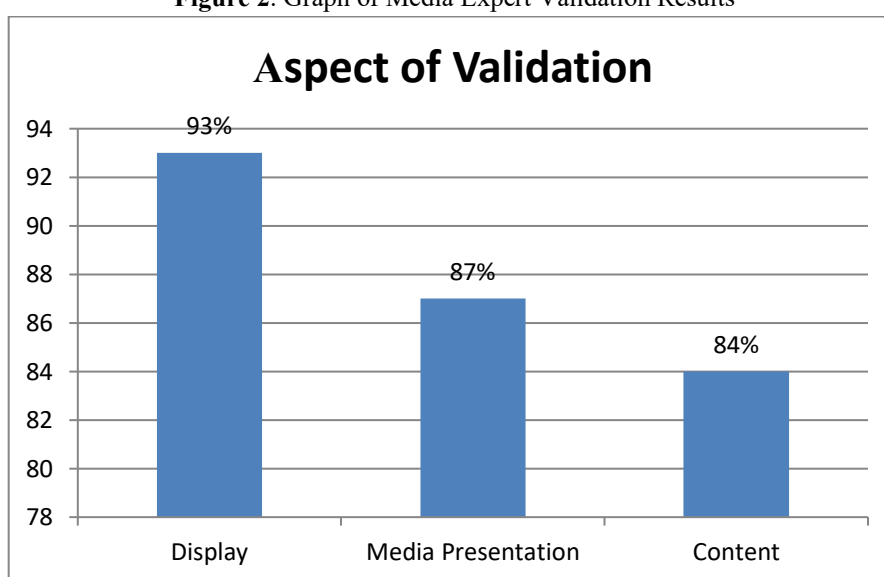
Development

At the development stage, the Snakes and Ladders learning media was created based on the design developed in the previous phase. Once completed, the media was validated by media and content experts and then revised based on feedback and suggestions from both experts. The content validation aimed to assess the accuracy and appropriateness of the instructional material to be developed.

a. Media Expert Validation

Validation by a media expert was conducted to determine the validity level of the Snakes and Ladders learning media based on cultural diversity. The product was reviewed by a media expert lecturer. The results of the media expert's assessment are presented in Figure 2.

Figure 2. Graph of Media Expert Validation Results

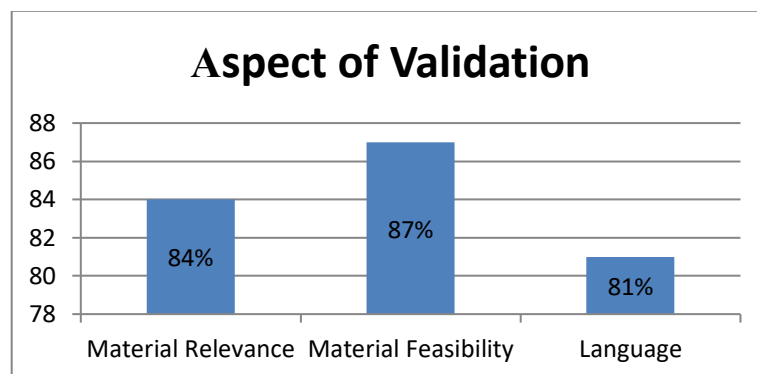


Based on Figure 2, the media expert's assessment shows that the visual aspect scored 93% with a criterion of "very valid," the presentation aspect scored 87% with a "very valid" rating, and the material aspect scored 84% with a "very valid" rating. The average score across all aspects was 88%, which falls into the "very valid" category. However, the media expert recommended revising the size of the game pieces and dice to better fit the game board.

b. Content Expert Validation

Validation by a content expert was conducted to determine the validity of the material presented in the Snakes and Ladders learning media. The content was reviewed by a content expert lecturer. The results of the assessment are shown in Figure 3.

Figure 3. Graph of Content Expert Validation Results

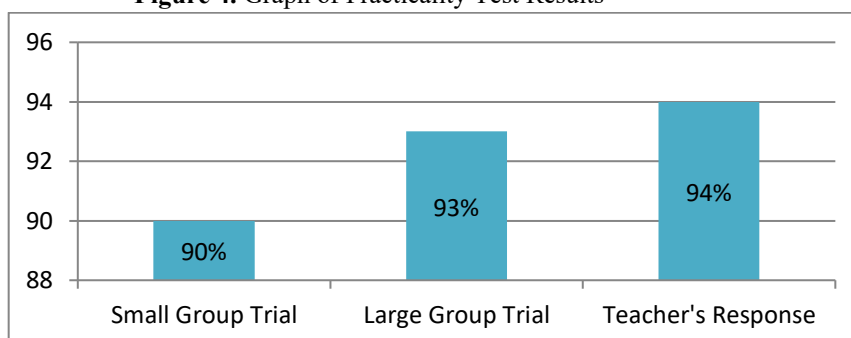


According to Figure 3, the content expert's assessment indicates that the relevance of the material scored 84% (“valid”), the content feasibility scored 87% (“very valid”), and the language aspect scored 81% (“valid”). The average score across the three aspects was 84%, which falls under the “very valid” category. The content expert also suggested revising the media by adding proper image sources.

4. Implementation

In the implementation phase, the Snakes and Ladders learning media based on Indonesian cultural diversity was tested on fifth-grade students at MI Nahrul Muhith. According to (Hadi & Gustiana, 2016), this phase involves applying the developed product within the actual learning environment. The trial was conducted in two stages: a small-group trial with 6 students and a large-group trial with 16 students. The students’ and teacher’s responses are presented in Figure 4.

Figure 4. Graph of Practicality Test Results



From Figure 4, the results show that the small-group trial achieved a practicality score of 90%, categorized as “very practical.” The large-group trial yielded a score of 93%, also categorized as “very practical.” This indicates that the Snakes and Ladders media is highly practical for use in the classroom. Student feedback noted that the media was visually appealing, easy to understand, engaging, and helped boost their enthusiasm to learn about cultural diversity.

The teacher’s response, gathered through a questionnaire, showed a practicality score of 94%, indicating that the media is “very practical” for classroom

use. The teacher also provided positive feedback, noting that the media was innovative, increased student engagement and interest, and effectively introduced students to the concept of Indonesia's cultural diversity.

Evaluation

The evaluation stage is the final step conducted to determine the effectiveness of the Snakes and Ladders media that has been developed. The level of effectiveness was measured based on students' learning outcomes after using the media. The evaluation administered to students consisted of a formative test containing 10 questions.

The media is considered effective if it meets the effectiveness criteria based on the Minimum Mastery Criteria established by the school, which is a minimum score of 65 for the Pancasila Education subject. The effectiveness of the Snakes and Ladders learning media is also determined using the classical completeness criteria, which is 80% of students achieving the minimum score.

After the media trial, a formative test of 10 questions was administered to assess student learning outcomes. The results of this evaluation are presented in Table 1.

Table 1 Results of the trial

Student Test Score	Number of Students	Remarks
100	10	Passed
90	3	Passed
80	2	Passed
70	1	Passed
<60	0	Not Passed
Total	16	

Based on the percentage of the effectiveness level of the Snakes and Ladders learning media obtained from students' test results calculated using the classical mastery formula a score of 100% was achieved, indicating that the media falls into the "highly effective" category.

Umar et al. (2022) stated that classroom teaching delivered by teachers plays a significant role in the learning process. (Yulinda, 2023) emphasized that the effectiveness aspect is determined through the results of a formative test conducted at the evaluation stage, calculated using the classical mastery formula. The results of students' tests using the Snakes and Ladders media showed a 100% mastery rate, confirming that the media is highly effective for use in the learning process. A total of 16 fifth-grade students achieved scores above the Minimum Mastery Criteria, indicating an improvement in student learning outcomes after using the media. This demonstrates that the implementation of culturally diverse-based Snakes and Ladders media can enhance student interest in the Pancasila Education subject for fifth-grade students at MI Nahrul Muhith.

CONCLUSION

Based on the development process and the trial results of the culturally-based Snakes and Ladders learning media using the ADDIE model (Analysis, Design, Development, Implementation, and Evaluation), the following conclusions can be drawn. The validity percentage of the Snakes and Ladders learning media based on Indonesian cultural diversity was 87% according to the media expert (categorized as very valid) and 84% according to the material expert (also categorized as very valid). The practicality percentage of the culturally-based Snakes and Ladders learning media, based on student responses in the small group trial, was 90% (very practical), and 93% in the large group trial (very practical). The teacher's response reached 94%, also categorized as very practical. The effectiveness of the developed media based on students' test results showed a 100% classical learning mastery rate, indicating that the media is highly effective in increasing learning interest in Pancasila Education among fifth-grade students at MI Nahrul Muhith. It is recommended that future researchers consider developing this media into a digital or online game format to allow for wider and more flexible use. Further research can also be conducted at different grade levels or in other subjects to comprehensively measure the effectiveness of the media.

REFERENCES

- Anggraini, L., Hidayati, V. R., Istiningasih, S. (2023) Pengembangan Media GUTOP (Game Ular Tangga Operasi Hitung Pecahan) Materi Pecahan pada Mata Pelajaran Matematika untuk Kelas V SD. *Journal of Classroom Action Research*, 5(SpecialIssue), 168-173. <https://doi.org/10.29303/jcar.v5iSpecialIssue.3923>
- Aprilianto, A. D., & Mariana, W. (2018). Permainan Edukasi (Game) sebagai Strategi Pendidikan Karakter. *Jurnal Pendidikan Islam*, 1(1), 139-158. <https://doi.org/10.31538/nzh.v1i1.47>
- Arsyad, I., Kharisma, D. B., & Wiwoho, J. (2025). Artificial intelligence and Islamic finance industry: problems and oversight. *International Journal of Law and Management*.
- Audi, M., & Roussel, Y. (2024). Exploring the Link Between Public Health and External Debt in Saudi Arabia. *Journal of Business and Economic Options*, 7(4), 1-12.
- Audie, N. (2019). Peran Media Pembelajaran Meningkatkan Hasil Belajar Peserta Didik. *Prosiding Seminar Nasional Pendidikan FKIP*, 2(1), 586-595.
- Fitriansyah, F. (2017). Menumbuhkan Minat Siswa SD Terhadap Penemuan Ilmu Melalui Pembelajaran Aktif, Kritis, Kreatif dan Reflektif. *Jurnal Cakrawala*, 17(1), <https://doi.org/10.31294/jc.v17i1.1402> 31-39
- Gumilar, G., Nugraha, M. F., & Hendrawan, B. (2022). Pengembangan Media Pembelajaran Video Animasi Ujang Entis untuk Meningkatkan Hasil Belajar

- IPA Pada Materi Kalor Kelas V Sekolah Dasar. *Joyful Learning Journal*, 11(3), 100-107.
- Hadi, H., & Agustina, S. (2016). Pengembangan Buku Ajar Geografi Desa Kota Menggunakan Model ADDIE. *Jurnal Education*, 11(1), 90-105.
- Karisma, E. T., Setiawan, D., & Oktavianti, L. (2022). Analisis Minat Belajar Siswa pada Pembelajaran Kelas IV SDN Jleper 01. *Jurnal Prasasti Ilmu*, 2(3), 121-126.
- Kholipah, S., Maryatun, M., & Printandhari, M. (2020). Pengembangan Media Pembelajaran Ular Tangga Pada Mata Pelajaran Ekonomi Kelas X SMA Muhammadiyah 1 Metro Tahun Pelajaran 2017/2018. *Jurnal Ilmiah Pendidikan Ekonomi*, 1(1).
- Mulyatiningsih, E. (2016). Pengembangan model pembelajaran. Diakses dari <http://staff.uny.ac.id/sites/default/files/pengabdian/dra-endang-mulyatiningsih-mpd/7cpengembangan-model-pembelajaran.pdf> pada September.
- Umar, M., Riaz, Y., & Yousaf, I. (2022). Impact of Russian-Ukraine war on clean energy, conventional energy, and metal markets: Evidence from event study approach. *Resources Policy*, 79, 102966.
- Yulinda, N., Witono, A. H., & Fauzi, A. (2023). Pengembangan Media Miniatur Tiga Dimensi Berbahan Dasar Kertas untuk Pemahaman Diri Siswa Tentang Mitigasi Bencana di Kelas 6 Sekolah Dasar. *Journal of Classroom Action Research*, 5(SpecialIssue), 159-167.