

Social Media as a Learning Tool: Its Influence on the Critical Thinking of Slow Learner Students in Civics Education

Marsanda Puspitaningtias¹, Ambiro Puji Asmaroini², Sutrisno³

¹ Universitas Muhammadiyah Ponorogo, Indonesia; puspitamarsanda@gmail.com

² Universitas Muhammadiyah Ponorogo, Indonesia; ambirop@gmail.com

³ Universitas Muhammadiyah Ponorogo, Indonesia Ponorogo; sutrisno@umpo.ac.id

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ABSTRACT

In the digital era, social media is increasingly integrated into educational practices. However, its potential remains underutilized for students with special educational needs, particularly slow learners. This study investigates the impact of social media use on the critical thinking skills of slow learners within civic education instruction. A quantitative approach with a cross-sectional survey design was adopted. The sample comprised 55 slow learner students—30 from Junior High School 3 Ponorogo and 25 from Junior High School Muhammadiyah 2 Ponorogo. Data were collected using a validated and reliable questionnaire and analyzed through simple linear regression. The analysis revealed that social media use accounted for 22% of the variance in students' critical thinking skills ($R^2 = 0.22$). The effect size, calculated using Cohen's f^2 , was 0.282, indicating a moderate effect. Key improvements were noted in students' abilities to analyze, evaluate, and draw conclusions when social media was integrated into learning with teacher support. These findings suggest that purposeful and guided use of social media can significantly enhance critical thinking in slow learner students. The study highlights the importance of adaptive instructional design and teacher facilitation in maximizing the educational benefits of digital platforms. To foster inclusive and effective learning, educators should incorporate teacher-mediated social media strategies tailored to the needs of slow learners, particularly in civic education contexts.

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Corresponding Author:

Marsanda Puspitaningtias

Universitas Muhammadiyah Ponorogo, Indonesia; puspitamarsanda@gmail.com

1. INTRODUCTION

In the digital era, the utilization of social media in education has gained increasing attention as an alternative learning medium that is considered capable of supporting the learning process. According to a report published on the Garuda website (2024), there are approximately 220 million social media users in Indonesia, an increase of 10% compared to the previous year. As of January 2025, We Are Social and Data Reportal reported at least 143 million active social media accounts, equivalent to 50.2% of the total population of around 285 million people. On average, users spend approximately 3 hours and 15 minutes per day browsing digital content.

Given the high level of social media use among Indonesians, the opportunity to employ it as a learning medium is becoming increasingly promising (Zakiyyah, 2024). Social media not only provides accessibility and flexibility but also offers a variety of interactive features that can support engaging and meaningful learning experiences (Setyaningrum & Sulistyaningrum, 2025). Civic Education is a crucial subject in shaping students' character; however, several challenges remain unaddressed, particularly in its implementation for students with special educational needs, such as slow learners (Nur Aliyah, 2024).

As outlined in the Diagnostic and Statistical Manual of Mental Disorders (DSM-5; American Psychiatric Association, 2013), slow learners are identified as students with intellectual capacities ranging between IQ 70–88, which is below average yet does not meet the criteria for intellectual disability (Ultabaini & Pujaningsih, 2024). This condition is typically accompanied by adaptive functioning limitations that affect academic achievement, particularly in understanding abstract concepts and processing new information (Lee & Cheon, 2024). According to UNESCO (2023), learners with learning barriers, such as slow learners, require differentiated and adaptive learning approaches to achieve their optimal academic potential. Therefore, more structured and flexible teaching strategies are needed, including material repetition, consistent feedback, and the use of concrete media to facilitate concept comprehension (Indarsari & Utomo, 2022).

Based on these perspectives, teaching approaches for slow learners should be grounded in cognitive development theories emphasizing the role of social interaction in constructing knowledge. One relevant framework is Lev Vygotsky's social constructivist theory, which posits that learning occurs optimally through social interaction and guidance from more competent individuals within the Zone of Proximal Development (ZPD) (Schunk, 2020). Through teacher scaffolding and peer collaboration, slow learners can gradually enhance their critical thinking abilities. This perspective aligns with Bruner's constructivist theory, which emphasizes that students should actively engage in exploration and reflection for learning to become meaningful. Within digital education, this idea is further supported by Digital Literacy Theory, which defines digital literacy not merely as technical proficiency but as the ability to think critically, evaluatively, and reflectively in using digital media for learning purposes (Ng, 2012). Hence, integrating social media into civic education instruction represents a practical application of digital constructivism that promotes social interaction, collaboration, and the development of critical thinking among slow learners.

Slow learners require distinctive learning approaches and strategies to enhance their critical thinking skills an essential component for every citizen in understanding and analyzing national issues (Sunaryati, 2024). In this regard, civic education learning demands students' ability to analyze, synthesize, solve problems, draw conclusions, evaluate, and assess various social issues (Hendriani, 2020). This aligns with Sutrisno (2023), who argues that civic education functions as a medium for character formation and critical reasoning development to enable students to think reflectively about national challenges. Nevertheless, difficulties arise when slow learners encounter abstract materials such as those in *Pendidikan Pancasila*, which require more concrete and adaptive approaches (Aulia et al., 2024). Consequently, the assumption that social media automatically supports critical thinking development must be further examined within the context of special education (Sitohang, 2019).

Furthermore, slow learners possess belows-average cognitive abilities and require specialized teaching methods, such as repetition, visualisation, and concrete reinforcement (Korikana, 2020). Social media can serve as a tool to stimulate students critical thinking skills, including for those with learning barriers (Pratiwi, 2021). This highlights the importance of adaptive and inclusive learning approaches.

Field evidence indicates a significant gap in the use of social media by both teachers and slow learner students in civic education classrooms (Hanifah, 2024). This issue is compounded by teachers limited digital literacy and the absence of appropriate pedagogical strategies to foster critical thinking through social media (Cibro, 2025). The lack of digital media training and the incomplete integration of differentiated teaching strategies remain major barriers to the effective implementation of technology

based learning. This situation underscores the need for innovation in utilizing social media to better accommodate the unique characteristics of students with learning difficulties.

This condition reinforces that integrating social media into learning still faces numerous challenges, especially in the context of slow learners. Although access to social media has become more widespread, gaps persist in both teachers and students ability to use it optimally to support critical thinking development (Herliani & Apriliya, 2023). The scarcity of digital media training and the limited adoption of adaptive pedagogical models continue to hinder digital learning, particularly in conceptual subjects like civic education (Fadila et al., 2024).

According to Du and Wang (2024), most students use social media for more than two hours a day, yet only a portion of them employ it for academic purposes. This finding reinforces that social media can enhance students' critical thinking skills through features such as discussions, reflective video content, and digital storytelling (Bashiri & Kowsari, 2024). However, these studies primarily focus on digital natives, not slow learners, who have different cognitive and learning characteristics. This represents a significant gap in the existing literature. The general assumption that social media automatically enhances critical thinking thus requires further validation in adaptive learning contexts for slow learners.

Although several initiatives have been undertaken to improve civic education learning quality for students with special educational needs, such as promoting national values, harmony, and discipline, classroom practices remain dominated by lectures and memorisation (Sari & Afifah, 2025). Teachers also face difficulties in utilizing digital media due to limited technological competence and the lack of differentiated pedagogical application (Jannah, 2025). Consequently, learning tends to be less contextual and challenging to internalize, particularly for students with intellectual barriers such as slow learners.

Meanwhile, Puspitaningrum (2025) highlighted strategies for instilling civic values in civic education learning for students with special needs but found limited research specifically analyzing the effectiveness of integrating social media as an instructional aid for slow learners. Social media has significant potential to foster active participation and critical thinking when applied through adaptive and inclusive pedagogical approaches (Ambiro, 2024). Therefore, this study aims to examine the effect of social media use on the critical thinking skills of slow learner students in civic education learning, providing both theoretical and practical contributions to developing relevant instructional models in the digital era.

The novelty of this research lies in its empirical focus on slow learners within the context of social media use as a tool to enhance critical thinking skills in civic education. Unlike previous studies, which primarily investigated social media's impact on regular students or university level digital natives, this study focuses on students with cognitive limitations who require distinct pedagogical approaches.

Preliminary observations conducted at Junior High School 3, Ponorogo, and Junior High School Muhammadiyah 2, Ponorogo, revealed that several students identified as slow learners experienced difficulties comprehending civic education materials. Based on assessments and interviews with guidance and counselling teachers as well as civic education teachers, these students tended to be passive, required more time to complete tasks, and struggled to understand abstract concepts or express logical opinions. These preliminary findings underscore the importance of investigating the effect of social media use on the development of critical thinking skills among slow learners in civic education classrooms, particularly within inclusive education settings.

2. METHODS

This study employed a quantitative method to objectively describe the relationship between two variables based on numerical data. The instrument used was a questionnaire consisting of several closed-ended questions to be answered by the respondents. The research applied a quantitative approach with a cross-sectional survey design, in which data were collected within a specific period.

This approach was considered appropriate to explore the perceptions and characteristics of slow learner students regarding the use of social media and its relationship with critical thinking skills in the context of *Pendidikan Pancasila* learning.

The researcher collaborated with guidance and counseling (BK) teachers Junior High School 3 Ponorogo and Junior High School Muhammadiyah 2 Ponorogo to verify and confirm the number of students identified as having learning difficulties based on the classifications established by each school. A total of 55 slow learner students participated in this study, consisting of 30 students from Junior High School 3 Ponorogo and 25 students from Junior High School Muhammadiyah 2 Ponorogo. These schools were selected to provide an accurate and representative picture of the target population. The number of respondents was determined based on the limited population of slow learners in the research sites while still ensuring the validity and reliability of the data. A descriptive quantitative method was used to objectively explain the relationship between the two variables using numerical data. The research instrument consisted of a closed-ended questionnaire adapted from Hasanah and Hidayati (2021), designed to measure the use of social media and critical thinking ability among slow learners.

2.1. Respondent Characteristics

The researcher distributed questionnaires to eighth-grade students at Junior High School 3 Ponorogo and Junior High School Muhammadiyah 2 Ponorogo. Based on preliminary observations and academic data, students at Junior High School 3 Ponorogo generally demonstrated relatively low motivation and learning achievement, while Junior High School Muhammadiyah 2 Ponorogo identified several students with special educational needs, particularly those classified as slow learners. The identification process was conducted in collaboration with guidance and counseling (BK) teachers to ensure classification accuracy based on the school's psycho pedagogical assessment.

A total of 55 slow learner students participated in this study, consisting of 30 from Junior High School 3 Ponorogo and 25 from Junior High School Muhammadiyah 2 Ponorogo. The respondents were active users of social media platforms such as Instagram, TikTok, and YouTube but exhibited limitations in information processing speed and the ability to grasp abstract concepts. These characteristics align with the description of slow learners according to UNESCO (2019) and the DSM-5 (American Psychiatric Association, 2013), which defines them as students with below-average intellectual functioning who do not meet the criteria for intellectual disability but experience adaptive functioning challenges and lower academic performance.

2.2. Sampling Technique

Respondents were selected using a purposive sampling technique, considering the limited number of slow learner students identified at both schools. The total of 55 respondents was carefully determined to maintain data validity and contextual relevance. The researcher acknowledged that purposive sampling has limitations regarding generalizability; therefore, the findings of this study are interpreted specifically within the context of inclusive education at the junior high school level (Creswell, 2014).

The research instrument consisted of a closed-ended questionnaire using a 5-point Likert scale ranging from "strongly disagree" (1) to "strongly agree" (5). The questionnaire was adapted from Hasanah and Hidayati (2021), focusing on the use of social media in learning, and was modified to suit the characteristics of slow learner students. The instrument development process involved expert judgment from a *Pendidikan Civic Education* expert and a special education specialist to ensure content validity, indicator clarity, and language appropriateness according to the students' comprehension levels. Validity testing was conducted through item total correlation analysis ($p < 0.05$; $r > r\text{-table}$), while reliability testing used Cronbach's Alpha ≥ 0.6 (Sugiyono, 2019).

The operational definitions of the research variables are as follows:

1. Social media use is defined as the intensity, duration, and forms of student engagement in digital learning activities through platforms such as Instagram, TikTok, or YouTube. The measured dimensions include usage frequency, platform type, and learning-related purposes.
2. Critical thinking ability refers to the cognitive dimensions of Bloom's Revised Taxonomy by Anderson and Krathwohl (2001), encompassing analyzing, evaluating, and creating skills. Example questionnaire items include: "I can assess the accuracy of information I see on social media" and "I can compare multiple opinions before drawing a conclusion."

The questionnaires were distributed directly by the researcher at the schools with assistance from classroom teachers to ensure comfort and comprehension during completion. The research procedures adhered to ethical standards, including obtaining consent from the schools and parents of the participating students. Data analysis employed a quantitative approach using SPSS software and consisted of five main stages:

1. Validity testing ensured that each item accurately measured the intended construct using item-total correlation. Items were considered valid if the correlation value was significant ($p < 0.05$) and exceeded the r -table threshold.
2. Reliability testing assessed the internal consistency of the instrument, with Cronbach's Alpha values of ≥ 0.6 indicating acceptable reliability.
3. Normality testing employed the Kolmogorov-Smirnov method, as the sample size was 55 respondents. Data were considered normally distributed if the significance value exceeded 0.05.
4. Simple linear regression analysis measured the influence of the independent variable (social media use) on the dependent variable (critical thinking ability). The relationship was deemed significant when $\text{Sig.} < 0.05$, and the coefficient of determination (R^2) was used to assess the magnitude of the effect.
5. Effect size calculation was conducted using Cohen's f^2 formula (Cohen, 1988).

All stages of this research were systematically designed to produce valid and reliable findings that statistically examine the extent to which social media use influences the critical thinking ability of slow learner students in civic education learning (Creswell, 2014; Muhammad Ariq Musthofa et al., 2025).

3. FINDINGS AND DISCUSSION

This study was conducted with eighth-grade slow learner students at Junior High School 3 Ponorogo and Junior High School Muhammadiyah 2 Ponorogo using a quantitative approach. The main focus of this research was to identify effective strategies to enhance critical thinking skills through the use of social media, particularly platforms such as YouTube and TikTok, within the context of Civic Education learning. Based on the analysis of 55 respondents, this study revealed that the use of social media contributed 22% to the improvement of students' critical thinking skills. The implemented strategies consisted of three adaptive stages: planning, implementation, and evaluation tailored to the characteristics of slow learner students. Therefore, the integration of social media into the learning process proved to enhance active participation, foster logical reasoning, and strengthen the internalization of Pancasila values among students. Based on these results, the following findings were obtained.

3.1. Findings

The results of the study indicated that the use of social media had a significant influence on the critical thinking skills of slow learner students at Junior High School 3 Ponorogo and Junior High School Muhammadiyah 2 Ponorogo. Based on the data analysis, the R^2 value was 0.220, meaning that the use of social media explained 22% of the variance in students' critical thinking abilities, while the remaining 78% was influenced by other factors outside the model, such as teaching methods, family environment, and students' level of digital literacy. The use of social media in learning activities has the potential to

positively impact slow learners' critical thinking, mainly because its content is visual, interactive, and easily accessible. However, the fast-paced and ever-changing nature of social media can also reduce focus and cause overstimulation if not properly filtered (Fauziah, 2024). Slow learners require adaptive approaches, as they tend to struggle in understanding abstract concepts and need strong visual reinforcement (Upadhyay et al., 2025).

In the context of Civic Education, social media serves as an effective medium for conveying values contextually through animations, inspirational stories, or videos depicting democratic practices (Wulandari et al., 2024). This study found a significant 22% influence on students' critical thinking skills (Mi et al., 2025), although teacher guidance and appropriate learning design are still necessary, considering students' low digital literacy and their tendency to remain passive when consuming online content (Devi, Rahayu, & Dhani, 2022). Therefore, social media should be integrated into adaptive, value-based learning systems.

To strengthen the presented conclusions, this study also provides quantitative evidence showing the relationship between the intensity of social media use and the critical thinking skills of slow learner students. The data analysis involved a series of statistical tests, including validity, reliability, and simple regression tests, to determine the extent to which social media usage contributed to improving critical thinking abilities. The results are presented in tables illustrating the significance levels and the statistical strength of relationships between variables in the context of Civic Education learning.

3.1.1 Instrument Validity and Reliability Test

The validity test results showed that all indicators of both the independent variable (X) and dependent variable (Y) had item-total correlation values (r-calculated) greater than the r-table value of 0.266. This indicates that each questionnaire item significantly measured the intended construct. Thus, the research instrument was declared valid and relevant to measure the influence of variable X on variable Y according to the research objectives. The instrument consisted of two main variables: social media usage (X) and critical thinking skills (Y). Based on the validity test results, all questionnaire items had r-calculated values higher than 0.266 with a significance level below 0.05, confirming that all items were valid.

Table 1 Reliability Test Using Cronbach's Alpha

Variable	Cronbach's Alpha	Description
Variable X (Social Media Usage)	0,838	Reliable
Variable Y (Critical Thinking Skills)	0,866	Reliable

The reliability test using Cronbach's Alpha showed a value of 0.838 for variable X and 0.866 for variable Y, indicating a high level of internal consistency (Sujarweni, 2014). Since both values exceeded the threshold of 0.6, the instrument was considered reliable and suitable for further research.

3.1.2 Normality and Simple Linear Regression Test

The Kolmogorov-Smirnov normality test yielded a significance value of 0.200 (> 0.05), meaning that the data were normally distributed and met the assumptions of parametric analysis. Furthermore, the simple linear regression test showed that social media usage had a significant effect on the critical thinking skills of slow learner students at Junior High School Negeri 3 Ponorogo and Junior High School Muhammadiyah 2 Ponorogo.

Table 2. Simple Linear Regression (Model Summary)

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	0.469	0.220	0.206	3.796

The Model Summary shows that the R Square value was 0.220, indicating that social media use contributed 22.0% to students' critical thinking abilities. The remaining 78.0% was influenced by other variables outside the model, such as teaching methods, learning environment, and internal student factors.

Table 3. Model Significance Test (ANOVA)

Model	Sum of Squares	df	Mean Square	F	Sig.
1	213.799	1	213.799	14.976	0.000
Residual	763.728	53	14.410		
Total	979.527	54			

The ANOVA table shows a significance value of 0.000, which is lower than the 0.05 threshold, indicating that the regression model was significant. Thus, the null hypothesis (H_0) was rejected, and the alternative hypothesis (H_1) was accepted. This means that social media usage significantly affects the critical thinking skills of slow learner students, providing statistical evidence of a meaningful relationship between the two variables in the context of Civic Education.

Table 4. Coefficients (Effect of X on Y)

Model	Unstandardized Coefficient (B)	Std. Error	t	Sig.
(Constant)	29.970	3.517	8.521	0,000
Media Sosial (X)	0.337	0.087	3.870	0.000

Based on the Coefficients table, the regression coefficient (B) was 0.337 with a significance value of 0.000. This indicates that every one-unit increase in social media usage corresponds to a 0.337-point increase in students' critical thinking skills. Since the significance value was below 0.05, the relationship was statistically significant.

3.1.3 Effect Size Analysis

In addition to statistical significance through regression testing, this study also calculated the effect size using Cohen's f^2 index to assess the practical strength of the independent variable's influence on the dependent variable. According to Cohen (1988), effect size represents the strength of the relationship between variables and provides insight into the practical importance of the results, not merely their statistical significance. The effect size in this study was calculated using the following formula:

$$f^2 = \frac{R^2}{1 - R^2}$$

This formula, adopted from Cohen (1988), is widely applied in both simple and multiple regression analyses (Hair et al., 2019; Field, 2018). The R^2 value was obtained from the regression results, representing the proportion of variance in the dependent variable explained by the independent variable. Based on the regression analysis, $R^2 = 0.22$, and the effect size was calculated as follows:

$$f^2 = \frac{0.22}{1 - 0.22} = 0.282$$

The result of $f^2 = 0.282$ indicates a moderate effect according to Cohen's (1988) standard interpretation. Therefore, it can be concluded that social media usage has a moderate practical influence on the critical thinking skills of slow learner students. Although the 22% contribution is moderate statistically, its practical implication remains significant, especially within Civic Education, which emphasizes higher-order and reflective thinking skills. These results also suggest that social media is not the dominant factor but serves as an essential facilitator of visual and interactive learning for students with cognitive limitations. Other factors, such as teacher roles, family environment, emotional

support, and technological accessibility, also contribute to the optimal development of students' critical thinking abilities.

3.2. Strategies to Enhance the Critical Thinking Skills of Slow Learner Students through the Use of Social Media

The rapid advancement of digital technology has significantly transformed students' interactions with information and reshaped contemporary learning processes. Social media, initially utilized primarily for communication and entertainment, has evolved into a dynamic and interactive educational space. Within the framework of 21st-century education, it functions as a platform that fosters collaborative, reflective, and experiential learning. UNESCO (2023) emphasizes that the integration of digital technology in education broadens access to learning resources and promotes inclusivity, particularly for students with special needs, including slow learners. This perspective is consistent with Vygotsky's constructivist theory, which posits that social interaction and technological mediation serve as scaffolding to support learners in constructing knowledge within their Zone of Proximal Development (Santrock, 2021).

Despite this potential, a noticeable gap persists between the theoretical benefits of social media and its practical application for slow learner students. Observations conducted at Junior High School 3 Ponorogo and Junior High School Muhammadiyah 2 Ponorogo indicated that although students demonstrated strong enthusiasm for digital-based learning, many had not yet developed the capacity to utilize social media effectively for academic purposes. A considerable number experienced difficulty understanding abstract concepts and required concrete visualizations to facilitate comprehension. These findings underscore the necessity of adaptive learning strategies that position social media not merely as a supplementary resource but as a structured medium to strengthen critical engagement, particularly in Civic Education, which demands logical reasoning and reflective thinking.

Quantitative findings from questionnaire data revealed that the majority of slow learners had incorporated social media into their learning activities. Specifically, 69.1% of respondents agreed and 25.5% strongly agreed that they used social media as a learning resource, particularly for Civic Education subjects. Video and infographic content emerged as the most preferred formats (89.1%), while 76.4% of students reported actively searching for learning materials through social media platforms. The most frequently accessed platforms were TikTok (82.7%), Instagram (48.1%), and YouTube (21.2%). The predominance of video-based platforms indicates a preference for visual and auditory learning modalities, suggesting that slow learners benefit from concise, concrete, and engaging presentations of information (Upadhyay et al., 2025).

Qualitative data derived from interviews with Civic Education teachers corroborated these findings. Teachers observed that educational videos sourced from social media increased students' focus and enthusiasm during classroom discussions, particularly when the content was connected to familiar online social phenomena. Nevertheless, challenges were identified, as approximately 45% of students were easily distracted by non-educational content. This suggests that the effectiveness of social media as a learning medium is highly contingent upon teachers' ability to curate relevant materials and guide students through structured learning activities. Consequently, teachers' digital literacy and pedagogical competence play a decisive role in ensuring the productive integration of social media in instructional practice (Wulandari et al., 2024).

Overall, the findings demonstrate that structured and guided use of social media contributes positively to the development of slow learners' critical thinking skills. Observed indicators included the ability to analyze information, evaluate arguments, identify problems, and draw conclusions. A total of 89.1% of students reported comparing information from multiple sources, 85.4% frequently formulated logical conclusions based on viewed content, and 41.8% stated that social media assisted them in constructing opinions grounded in data. Although regression analysis indicated that social media usage contributed 22% to the improvement of critical thinking skills, the remaining 78% was

influenced by factors such as parental support, guidance counseling assistance, and individual learning motivation (Bui, 2023). These results suggest that while social media holds considerable potential as a reflective and analytical learning tool, its impact is optimized when integrated within a broader supportive educational environment.

The enhancement of critical thinking among slow learners was particularly evident when social media was employed in a structured and pedagogically guided manner. Students demonstrated improvements in analysis, synthesis, problem-solving, evaluation, and judgment. For instance, 89.1% reported verifying information across multiple sources before making decisions, 85.4% regularly derived conclusions from viewed materials, and 41.8% indicated that social media facilitated the formation of evidence-based opinions. These findings are consistent with previous studies at the secondary education level, which indicate that academically oriented use of social media can significantly strengthen students' critical thinking capacities (Duterte, 2025).

Building upon these findings, an adaptive instructional strategy was formulated, encompassing interconnected processes of planning, implementation, and evaluation. The planning process involved identifying students' learning needs through assessment and observation, designing structured online discussion forums via platforms such as WhatsApp Groups or Google Classroom, and integrating contextual multimedia materials tailored to slow learners' cognitive characteristics. Teachers collaborated with guidance and counseling staff to regulate the intensity and duration of online activities to prevent cognitive overload and assessed students' digital readiness, including device availability and internet access. This inclusive and adaptive planning approach aligns with research indicating that structured and responsive use of social media enhances intrinsic motivation and academic engagement (Gulzar et al., 2022).

During implementation, teachers facilitated structured digital discussions in which students engaged with multimedia content related to Pancasila values and examined its relevance to real-life social contexts. Students also completed digital projects, such as creating posters or short videos illustrating civic values, which were subsequently shared through school-affiliated social media platforms. Survey data indicated that 82% of students found this method helpful in understanding abstract civic concepts such as democracy and social responsibility. In alignment with prior research (Manca, 2020; Ramadhani et al., 2022), collaborative digital learning strengthened both critical thinking and learner confidence. Nevertheless, implementation challenges included limited device access, varying levels of digital literacy, and susceptibility to distractions from entertainment content, reinforcing the central role of teachers in moderating interactions and maintaining instructional focus.

Evaluation was conducted through both formative and summative approaches to assess the effectiveness of social media-based strategies in enhancing critical thinking skills. Formative evaluation involved reflective writing activities posted on school social media platforms, followed by teacher feedback aimed at reinforcing analytical reasoning and clarifying misconceptions. These reflective practices supported students' development of metacognitive awareness and evaluative skills, consistent with findings by Jabarian and Sartori (2023). Additionally, peer review activities were implemented to cultivate logical reasoning and shared learning responsibility. Collectively, the findings affirm that while social media constitutes a meaningful pedagogical tool for slow learners, its effectiveness depends on structured integration, professional guidance, and supportive environmental factors.

Discussion

The optimal strategy recommended in this study includes the following: During the planning stage, teachers design structured discussion forums using platforms such as WhatsApp Groups or Google Classroom, and prepare multimedia content such as videos and infographics specifically created to help slow learner students grasp abstract concepts more concretely. This approach has proven effective in enhancing creativity and academic engagement through intrinsic

motivation, as evidenced by studies highlighting the role of social media in developing information technologi skills and creativity among elementary school students (Tasbihah & Ningsih, 2023).

In the implementation stage, teachers facilitate time limited discussions that allow slow learners to analyze before responding. The learning materials are presented through engaging multimedia content, and students are encouraged to participate in digital collaborative tasks, such as creating creative content about Pancasila values that promote cooperation, creativity, and critical thinking. This strategy aligns with research findings indicating that the use of social media can enhance creativity and collaboration in Pancasila and Citizenship Education (Laoli et al., 2024).

The evaluation stage is conducted through online reflections posted by students on social media, followed by direct feedback from teachers. This reflective practice has been shown to strengthen students' critical engagement and self evaluation, consistent with evidence that social media can serve as an innovative tool for interactive and reflective learning (Poernomo et al., 2025). Evaluation also serves as the basis for improving subsequent learning strategies to remain adaptive to the unique needs of slow learners.

Therefore, the social media based learning strategies outlined in this study are expected to be adaptable and widely applicable across various educational contexts, particularly in schools that serve students with special learning needs such as slow learners. Implementing these strategies is believed to enhance the effectiveness of Civic Education by strengthening critical thinking skills including analysis, evaluation, inference, and problem solving. This finding supports Bui (2023), who reported that the integration of multimedia-based social media can increase learning engagement and facilitate understanding of abstract concepts. Similarly, Galindo-Domínguez (2025) emphasized that guided interactions on social media can significantly improve students' critical thinking skills, especially in collaborative learning contexts. Thus, structured use of social media can become an effective learning model for slow learners, provided it is supported by teacher guidance and adaptive pedagogical strategies.

The indicators that need to be developed in the learning process to enhance slow learners' critical thinking skills include the ability to analyze information, construct logical opinions, compare multiple sources, and connect learning materials with real world phenomena. In addition, reflection, decision-making, and digital distraction management skills are also key indicators of successful learning (Garcés-Fuenmayor et al., 2025). Hence, the development of critical thinking should not only focus on cognitive aspects but also include metacognitive and affective dimensions that support deeper reasoning.

Based on this study, four social media-based learning strategies were identified as the most significant in improving slow learners' critical thinking skills:

1. Structured discussions conducted through social media.
2. Multimedia-based presentation of learning materials.
3. Digital collaborative tasks.
4. Online reflection with direct feedback from teachers.

Pedagogically, these findings imply that social media should not merely function as a platform for entertainment but as a collaborative learning space that encourages analytical and reflective thinking. Teachers play a crucial role as facilitators in guiding students to manage information, analyze digital content, and avoid distractions during the learning process. Teachers interviewed also noted that using educational videos from social media made students more focused and enthusiastic during discussions, demonstrating that social media based learning strategies can strengthen students' motivation and emotional engagement in learning. Therefore, the integration of social media into learning must be accompanied by adaptive pedagogical design and continuous support from teachers and school counselors.

Nevertheless, several limitations should be acknowledged. First, the relatively small number of respondents and the focus on only two schools in the Ponorogo region limit the generalizability of the findings. Second, the questionnaire-based instrument may contain subjective bias since it relies on

students' self-reported data. Third, this study did not explore in depth the external factors that may also influence critical thinking skills, such as family support, digital literacy, and the home learning environment. These limitations provide an important foundation for broader and more in-depth future research.

Future studies are recommended to expand the research context by involving more schools from various educational levels and regions to obtain a more comprehensive understanding of how social media affects critical thinking development. Subsequent studies could also examine the use of other platforms such as X (Twitter), Discord, or Telegram as academic discussion media, and incorporate qualitative approaches to explore slow learners' learning experiences more deeply. Furthermore, integrating social media use with value-based learning strategies in Civic Education should be examined to optimize affective and social outcomes in the learning process. In this way, this study contributes not only to understanding the role of social media in inclusive education but also opens new opportunities for developing adaptive, reflective, and sustainable digital learning models.

4. CONCLUSION

This study concludes that the purposeful and structured use of social media contributes positively to improving the critical thinking skills of slow learner students in Civic Education, with a contribution level of 22%, indicating that social media functions as a supportive—rather than singular—factor in fostering analytical, evaluative, and reflective thinking. When integrated through guided discussions, contextual multimedia content, collaborative digital assignments, and reflective online activities, social media creates more concrete, engaging, and accessible learning experiences aligned with the cognitive characteristics of slow learners. The findings further highlight that its effectiveness depends largely on teacher facilitation, collaboration with school counselors, and students' levels of digital literacy, underscoring the importance of adaptive pedagogical design and consistent supervision. However, this study is limited by its relatively small sample drawn from only two schools in Ponorogo Regency and its reliance on self-reported questionnaire data, which may affect the generalizability and objectivity of the results; additionally, external variables such as parental support, access to digital devices, and teachers' technological competence were not comprehensively examined. Therefore, future research should involve a broader range of schools across diverse regions and educational levels, incorporate mixed-method or longitudinal designs, and investigate the pedagogical potential of various digital platforms while examining the interaction between social media use and value-based Civic Education strategies to optimize both cognitive and socio-affective learning outcomes in inclusive educational settings.

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