Literacy Skills of Digital-Age Primary School Students in Mandailing Natal Regency

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Abstract

This research aimed to investigate literacy skills, the underlying causes of low literacy levels, and the implications for primary school students in the digital age. The researcher employed a qualitative field research methodology, collecting data through participatory observation, in-depth interviews, and the utilization of Google Forms. The data analysis involved systematic reduction, presentation of findings, and the formulation of conclusions, all while employing coding techniques and categorizing themes. The findings indicate that the literacy skills of elementary school students in Indonesia remain significantly underdeveloped. A considerable number of students encounter difficulties in comprehending simple texts, organizing their thoughts in writing, and understanding the material presented by teachers. Additionally, they face challenges in grasping fundamental mathematics and science concepts, as well as effectively utilizing digital tools in their educational experiences. Several factors contribute to the observed low literacy levels, including a lack of supportive familial environments, inadequate integration of technology in educational settings, ineffective instructional models, and limited access to digital resources and training. The repercussions of insufficient literacy skills are evident in students' difficulties in solving problems, accessing information, and articulating their thoughts, both verbally and in written form. To mitigate this issue, it is recommended that educators integrate digital tools into their pedagogical strategies. This can be achieved through the implementation of project-based learning and the use of educational podcasts disseminated via online platforms.

INTRODUCTION

Literacy education and language for primary school students is an essential and fundamental aspect in the digital era. The skills that must be mastered today are basic science, numeracy, library, digital, and cultural literacy. These skills are importantbecause they can help students access, find, create, and use information and improve their ability to develop more (Ministry of Education and Culture, 2016). However, it has been found that students' literacy skills are currently low. The ability to read is 46.83%, inthe category of insufficient (Ministry of Education and Culture, 2016). Then, 35% of Indonesian students for reading activities, and the rest for playing, watching, and other (Ministry of Education and Culture, 2019). (Ministry of Education and Culture, 2019). From 2016 to 2017, interest in reading was still low (National Library, 2021). Grade 4 students of SD Negeri 100020 Simardona are less able to decipher the key points of reading sources (Enni Murni Harahap, 2024). They have difficulty uncovering the main message and determining this sentence from the reading text. In solving numerical problems, SD Negeri 116 Percontohan Panyabungan students, Mandailing Natal Regency, are still low (Bajora Hasibuan, 2024).

Several findings have been put forward that primary school students' literacy skills still have problems that need to be improved. For example, the average reading, science, and maths scores were 54.46% (Harahap et al., 2022). The condition of ability to read, speak, write, and listen to primary school students in the COVID-19 pandemic era in Mandailing Natal Regency has several problems, including lack of memorization and useof punctuation marks, low motivation to write. (Parulian Siregar, Suadi, 2021). Students'literacy culture is still not good due to the minimal role of parents in guiding children (Khofifah & Ramadan, 2021). Science literacy skills in the content aspect are quite low in Adiwiyata Padang schools. (Safrizal et al., 2020).. These findings indicate that the literacy skills of primary school students in Indonesia are still low. The results presentedabove still have shortcomings, including limited samples and certain geographical areas that limit generalization. There is a lack of in-depth analysis that provides an overviewof student literacy without looking at the factors and implications.

The above article does not fully describe the literacy skills of school students in the digital era. For this reason, this paper is conducted to find a picture of literacy skills, its low factors, and implications. This study's findings will address the current gap in the literacy skills of primary school students. Students' literacy skills are very important to be studied more thoroughly so that the human resources of primary school students will improve. Conceptually and theoretically, this research is valuable because it has practical value for improving the quality of education.

The findings of this study are useful for improving the quality of literacy of primary school students in Indonesia in the digital era. Literacy skills will certainly

enablestudents to think more critically, creatively, and innovatively and improve their problem-solving skills. To improve literacy skills, the reconstruction of educational policies that are adaptive to technological advances should be carried out. (Fullan, 2013). In the digitalera, which is increasingly easy to access, it has implications for the ease with which students can explore information. Digital technology greatly affects students' literacy skills (Prensky, 2001). Students' literacy skills are considered important because they will impact the quality of human resources in the future.

Basic literacy is listening, speaking, reading, writing, and calculating, which is closely related to the ability to analyze, take into account, perceive information, communicate, and describe information based on personal understanding and inference. (Novarina et al., 2019).. Basic literacy is fundamental for individual primary school students to function effectively in everyday life and in society. It includes basic skills such as listening well, speaking clearly, reading with comprehension, writing well, and calculatingappropriately. Basic literacy provides an important foundation for further learning and developing additional skills in one's life and career. (Umi Atun Sholikhah., 2023).Strong basic literacy allows one to access information, participate in dialogue and discussion, and make informed decisions in various contexts.

Reading literacy in the context of basic literacy is defined as an individual's capacity to comprehend, use, and analyze comprehensively written texts to explore themeaning therein, develop knowledge and potential, and participate in society. (Centre for Education Assessment Balitbang Kemendikbud, 2019). Thus, it is important to fullyintegrate literacy skills into the curriculum so that students can understand variousthings they face. To realize the importance of literacy, including information literacy, it is necessary to work with relevant governments and institutions to develop acomprehensive framework for improving students' literacy skills. (Schubert Foo., 2014)..Literacy skills are fundamental for primary school students as they help them develop cognitive, social, and emotional skills (Nugrahanto & Zuchdi, 2019).Literacy skills in the context of education in today's digital age consist of reading andwriting, numeracy, science, finance, digital and cultural literacy, and citizenship.(Novarina et al., 2019). With basic literacy, primary school students will be able to develop the ability to read, write, understand, and interpret text, which is needed in thelearning process. Literacy also helps students develop critical thinking skills, improve understanding, and build imagination and creativity.

Literacy skills are essential abilities that must be possessed by every individual elementary school student (Novarina et al., 2019). In the context of primary school students, reading literacy is closely related to improving learning outcomes. Reading literacy is a key skill that forms a solid educational foundation. Students with higher reading literacy levels tend to achieve better learning outcomes. (Setiani1 et al.,

2016). In addition, information literacy, as part of basic literacy, is also an important issue in thecurrent digital era. The information generated must be carefully filtered to ensure its accuracy and credibility.

In the context of evaluating students' literacy skills in Indonesia, reading literacy is still in the low category. Likewise, science literacy skills are very low, and the percentage of mathematics literacy skills is also categorized as low. (Harahap et al., 2022).. The low ability of students cannot be separated from the difficulties faced byprimary school students in improving their literacy skills. Among the contributing factors are inadequate literacy practices carried out by teachers, lack of available literacyenvironments, and differences in parents' literacy levels, which impact the lowinformation literacy obtained by students from home. (Nuroh & Liansari, 2018).

Primary school students are unique individuals with physical, psychological, and academic abilities and readiness to develop through learning. (*Law No20 Year 2003 on National Education System*, 2006). Children of primary school age have unique characteristics, including playing while learning. Thus, teachers mustcreate learning models that allow students to move and work in groups. (Mutia, 2021). Then, elementary students enter the concrete operational period, which requires more straightforward teacher explanations and provides opportunities for students to be directly involved in thelearning process. Each child has varied abilities and learning needs, so teachers need to provide treatment so that they can develop optimally.

In today's digital era, primary school students must have several abilities to develop well. Critical thinking skills are important expertise that enables students to understand and solve the complex problems they face. Critical thinking is about passively receiving information and the ability to analyze, evaluate, and solve problems rationally (Oktifa, 2022). Communication skills are vital for primary school students to convey ideas and information effectively and clearly. This ability is part of the basic literacy skills that students must have. In addition, students also need tobe equipped with literacy skills, including digital literacy, to be able to select various information received.

Literacy skills in the digital era must be built with basic literacy skills, such as reading books, which are closely related to the habit of reading books. Book information is more reliable because it has gone through several procedures. The skills that primary school students must acquire in the current digital era include a variety of basic literacy skills (Nuroh & Liansari, 2018). Basic literacy is very important in everydaylife because it is the basis for individuals' various activities. Digitalliteracy skills in the digital era include sharing skills, creation in various forms and methods, collaboration, and digital technology communication.

Digitalization is now important in influencing primary school students'literacy skills. (Putri & Ahmadi, 2023). Digitalization has several positive impacts on

students' literacy skills, including improving verbal skills, managing information, reading interest, and using communication and information tools. However, it is important to remember that access to technology and the internet is uneven worldwide. Hence, education and training that prioritizes digital literacy are key to ensuring that individuals and communities have effective digital literacy skills. The digital age has changed the education paradigm for primary school students, affecting many aspects of their lives. Using digital learning apps and platforms creates interactive and engaging learning experiences through games, videos, and other activities. The use of technology in primary schools helps students build technology skills essential for modern life, such as the use of hardware, software, and an understanding of the internet.

METHODS

The type of research used in this paper is descriptive qualitative. This approach was chosen because this study focuses on an in-depth understanding of primary school students' literacy skills in Indonesia in the digital era. The research location was chosen based on considerations of cultural diversity and the social context of various regions in Indonesia. This allows researchers to gain more comprehensive insights and findings. The design of the research location is considered representative of obtaining valid and comprehensive data. This study describes social phenomena and symptoms that occur genuinely and as-is about the literacy of primary school students in Indonesia in the digital era. This approach will allow researchers to explore the skills and contextual factors influencing literacy skills and their implications.

The object of this study is students' literacy skills, which include aspects of reading, writing, and skills in understanding digital information, both from online and print media. This capability is studied within the framework of implementing digital literacy in the modern era in the Mandailing Natal Regency. To ensure the representativeness of the data, this research included 10 elementary schools spread across several sub-districts, selected randomly using the cluster random sampling technique. The selection of schools considers geographic diversity and level of access to technology to provide a holistic picture of students' literacy abilities. Meanwhile, the subjects of this research were students in grades IV and V from 10 elementary schools, with a total number of respondents of 300 students. The number of subjects was chosen by considering the principle of minimum sample size so that research results can be concluded validly. These respondents have met the criteria as a representative sample based on age, education level, and exposure to digital technology. The data collected included interviews and observations, which were then analyzed qualitatively.

Data were collected from various sources, including direct observation,

interviews with students, teachers, and parents, and document analysis across Indonesia (respondents/primary data sources). Data sources included recordings of learning activities and literacy test results. Subjects were selected using a combination of *purposive and snowball sampling* techniques with certain considerations according to theneed for informants' understanding of the research problem. Data was collected through participatory classroom observations, in-depth interviews with stakeholders, and document analysis related to the literacy skills of primary school students in Indonesia in the digital era. In addition to direct interviews, itwas also conducted through *video calls* and Google *forms* that would be distributed to all subjects. Before distributing the Google form, respondents were asked for their willingness and then given a detailed explanation of the purpose of the research. The data analysis process followed by Miles and Huberman (1992) consists of three main stages: *data* reduction, *data* presentation, and *conclusion drawing verification.*

Data reduction is summarizing and selecting important information from raw data obtained from the field. This process includes coding, categorizing, and focusing on data that is relevant to the research objectives. Reduction is carried out continuously throughout the research to avoid the accumulation of unused data and direct the focus of analysis. For example, a long interview can be summarized into important quotes that fit the research theme. Presenting data involves organizing information in a more structured form, such as a matrix, graph, or narrative. This presentation makes it easier for researchers to understand patterns, relationships, or trends that emerge from the data. Initial conclusions from the data must be verified again by looking at the evidence supporting them. This verification was carried out to ensure the validity of the findings, both through data triangulation and cross-checking with informants. This process ensures the validity of research results and strengthens the accuracy of data interpretation.

RESULTS

1. Literacy skills of digital-age primary school students

Based on data obtained through observations and interviews, primary school students' literacy skills in Indonesia are still low in various aspects. The details can be seen in Table 1.

Table 1. Literacy skills of digital-age primary school students

Source	Data/Findings	Cording
Observation result,22 May 2024	Primary school students in Indonesia areless able to read with comprehension of simple texts	Lack of understanding of the text

E.M (2024, Interview result	Student's ability to write and compose ideas is still limited. For example, difficultyin composing sentences well in accordance with the reading results	Less able to construct sentences
A.P: 2024 (Interview result)	Primary school students are less able to understand instructions delivered verbally	Lack of understanding of verbal instructions
P.M: 2024 (Interview result)	Only 15% of primary school students inIndonesia are active in speaking and expressing their opinions.	Less active speaking
Bajora H., (2024). Methods: Interview	Students are less able to understand basic mathematics concepts such as division, addition, subtraction, and multiplication instory problems.	Lack of understanding of mathematical concepts
(Harahap et al., 2022)	Primary school students in Indonesia areless able to understand science concepts related to everyday life.	Weak concept understanding
(Nurul Alfia., 2020)	Although access to technology is increasingly available, students lack basic skills in using technology tools in learning.	Less skilled

Based on the table above, the reading literacy skills of school students in Indonesiain the digital era are still poor, and they are still less able to understand simple texts. In addition, students also have difficulty organizing ideas in the form of paragraphs. In learning, students still have a low understanding of the material explained by the teacher. Meanwhile, in the aspect of speaking literacy, only a small proportion are active in conveying ideas and opinions. In mathematical literacy, students lack an understanding of story problems and apply them in problem-solving. Science literacy is still low; for example, students do not understand science concepts related to real life. Then, although technological developments are increasingly accessible, the skills to use digital tools are still limited.

The findings above show that several aspects are important in the literacy skills of primary school students in the digital era. The reading literacy aspect isstill low, and there are difficulties in understanding simple texts. The writing literacy aspect is less skillful in composing ideas in written form. The listening literacy aspect is less understanding of the material explained by the teacher. Regarding speaking literacy, students are less active in expressing their opinions. Meanwhile, in mathematics literacy, students have difficulty understanding mathematical concepts contained in story problems. Meanwhile, the science literacy aspect is also still low. Finally, the digital literacy aspect is still limited, so it needs improvement to maximize its potential in this digital era.

In the context of primary school students' literacy, based on the phenomena found,it has continued into the digital era. Such conditions will continue if there is a lack ofeffective improvement efforts. The current literacy skills of primary school students in Indonesia illustrate that there are still many major challenges in improving the quality of education in Indonesia. This includes reading, writing, listening, speaking, maths, science,and digital literacy.

2. Factors contributing to low literacy skills among primary school students

Based on the study's results, several factors contributed to the low literacy skills of primary school students. These factors include a less supportive family environment, limited use of technology, lack of interactive learning media, and limited resources and training. The details of these factors are presented in Table 2.

Table 2. Factors contributing to low literacy skills
among primary school students

Source	Data	Cording
(Opingo, 2024)	The low reading skills of elementary school students are due to a home environment that isless supportive of reading learning, such as the lack of time with parents to read with theirchildren.	Family environment
(MRS; 2024 (Interview result)	The lack of utilization of technology in learningto write is a factor in students' low motivation and writing skills.	Lack of technology utilization
E.S; 2024(Interview result)	A factor in the low ability of students to listento teacher instructions is the lack of learning	Lack of learning media

	media that supports listening skills.	
N.H; (2024). (Interview result)	Primary school students' speaking literacy skills are low due to the lack of interactivelearning.	Lack of interactive learning
Ridoan, (2024).	The factor that makes students less able to solve story problems is their critical reasoning power is still low	Low critical power
A.M; (2024). (Interview result)	A factor in primary school students' low science literacy skills is the limited sciencelaboratories used in learning.	Limited learning resources
E.M: 2024 (Interview result)	Low digital literacy skills in primary school students in Indonesia due to lack of technologyaccess and training in primary schools	Lack of access to technology

The low reading literacy skills of primary school students in Indonesia are due to a less supportive family environment. The lack of utilization of technological tools in learning to write is the cause of students' low writing skills. Learning media that is less relevant to students' characteristics has implications for students' weak listening power from the teacher's explanation. Conveying ideas is still not good due to the learning model used, which is less interactive and effective. In solving story problems, students have not been able to solve them well due to the low critical reasoningpower of students. In addition, the cause of low science literacy skills is due to limited science laboratories. Meanwhile, limited digital access and training is a factor in the lowliteracy of students in the digital era.

The low literacy culture in society results in a lack of encouragement to read. Students only read for about 15-30 minutes every day due to a lack of appreciation forthe importance of literacy. In addition, students' lack of vocabulary is also a problem,making it difficult for them to convey and write ideas well. Ineffective learning modelsalso reduce their interest and motivation to learn. Lack of practice in re-explainingmaterials and stories told by teachers also has a negative impact, reducing students'understanding of the subject matter. Not only that, students' low critical reasoning skillsmake it difficult for them to solve story problems well. Limited learning resources and lack of parental supervision,

especially in the digital era, hinder students' access to reading materials and monitoring of their literacy activities. Thus, these factors are interconnectedand can reinforce each other, causing students' low reading literacy skills in Indonesia.

The various facts found will have an impact on the quality of literacy of primary school students. Individual student factors such as low reading can be an obstacle in developing student literacy. Excessive use of social media can distract students from moreproductive literacy activities. Excessive television and mobile phone influence can also reduce the time spent on literacy activities in acquiring knowledge and skills from digitalsources. Learning environments such as adequate and varied learning resources influence students' interest and ability in reading. The availability of teachers trained in teaching literacy and providing guidance to students is crucial in introducing a library literacy culture that provides easy access to library resources. Mastery of literacy conceptsand theories also influences the way students are taught and supports the development ofstudents' traditions. Furthermore, the teacher-centered approach to learning makes it possible for teachers not to provide appropriate guidance to students to develop literacy skills.

3. The Implications of Low Literacy Skills of Digital-Age Primary School Students

The results revealed that primary school students' low literacy skills in the digital era in the Mandailing Natal district have significant implications for various aspects of learning. These findings include impacts on critical thinking skills, the ability to express ideas, participation in the learning process, understanding of mathematics and science concepts, and utilization of digital technology. The following is a summary of these implications presented in Table 3.

Table 3. The Implications of Low Literacy Skills of Digital-Age
Primary School Students in Mandailing Natal Regency

Source	Data	Cording
M.S: 2014 (Interview result)	Students' low reading literacy skills affect their critical thinking skills, making it difficult to understand more complex texts.	Lack of critical thinking
R.D: 2024 (Interview result)	Low writing ability implies that it inhibits students from expressing ideas inwriting.	Kuram can express ideas.
MRS, (2024). Interview result	Students who have difficulty listening to the teacher's explanation have an impact on delays in	Learning delay

	participating in the learning process.	
P.M; 2024 (Interview result)	Less competent speaking skills result in less participation in class discussions	Less able to convey ideas
Eriani, Ahmad Royhan: 2024	Students who have difficulty understanding basic mathematics concepts have implicationsfor their low ability to solve mathematics problems.	Less adept at solving maths
E. M., 2024 Interview result	Lack of understanding of basic science concepts can have implications for students' low analyticalskills related to science concepts in the real world.	Less able to analyze
E.; (2024). (Interview result)	Low digital literacy skills mean that students cannot effectively utilize digital technology for learning purposes.	Less use of technology

Table 3 shows that students' low reading literacy skills have implications for their critical thinkingskills, making it difficult to understand more complex texts. The implication of low writing skills hinders students from expressing ideas in writing well. Students who have difficulty in listening and capturing teacher explanations experience delays in participating in learning experience activities. Incompetent speaking skills result in minimal participation in learning discussions. Students who have difficulty understanding basic mathematics concepts have implications for their low ability to solvemathematics problems, especially those related to story problems. A low understanding of basic science concepts causes students to be less skilled in analyzing science concepts inreal life. Then, the low digital literacy skills make students unable to utilize digital technology for learning activities effectively.

The literacy skills of primary school students in Indonesia need to be improved withvarious strategies. Improving the reading literacy of primary school students can bedone by implementing e-books and reading applications that attract interest. (Brown, J., & Green, 2019).. A project-based learning model is a strategy to improve students' writing skills. (Soffiany & Purbani, 2020). Educational podcasts can be used to improve listening literacy (Ramli & Kurniawan, 2018). (Ramli & Kurniawan, 2018). Improving speaking literacy can be done by integrating storytelling into learning (Widodo, A., & Rahayu, 2021). (Widodo, A., & Rahayu, 2021).. The strategy

to improve the mathematical literacy skills of elementary school students is to develop a game-based interactive learning model (Supriyadi, T., Nugroho, A., & Rahayu, 2021). (Supriyadi, T., Nugroho, A., & Kurniawan, 2020).. Meanwhile, a strategy to improve digital literacy is to train technology use skills through online learning platforms (Ng, 2019). (Ng, 2019).

The strategies identified have the opportunity to improve the literacy skills of primary school students in digital Indonesia. Using engaging e-books and reading apps can make the learning process interactive and improve reading comprehension (Larson, 2010). Project-based learning can encourage students to be more creative in writing from real life. The use of podcast media in learning allows students to develop listening skills because of the availability of various content. Storytelling effectively improves speaking skills, as students are encouraged to tell stories, communicate, and think critically. (Isbell, R. T., Sobol, J., Lindauer, L., & Lowrance, 2004). Educational game-based learning can help students understand basic mathematics concepts better. Skills in using online learning platforms can improve students' digital literacy skills as they provide a range of flexible access based on students' needs. (Redecker, C., & Punie, 2017). By implementing these strategies consistently and continuously, schools can improve and develop students' overall literacy skills.

DISCUSSION

1. Literacy Skills of Digital-Age Primary School Students

The literacy skills of students in Indonesia in this digital era are still lacking in understanding the structure of writing and ideas. They have difficulty determining the main and subordinate sentences and organizing them properly. In addition, writing skills are still lacking. For example, they find it difficult to express the ideas that are in their minds. Students also lack confidence in conveying ideas, so what they say is unclear. On the other hand, in the context of mathematics, students also have difficulties understanding the concept of story problems and applying them in problem-solving. This difficulty can be caused by a lack of understanding of the basics of mathematics or difficulty in applying more complex concepts. In addition, students use digital tools mostly for online games, TikTok, and Facebook rather than for learning and self-development purposes.

Primary school students' literacy skills still need to be improved, especially in aspects such as science and maths (Harahap et al., 2022). This suggests that there is a need to develop a stronger curriculum to implement more effective learning methods to help students gain a better understanding of science and maths. Digital literacy skills of primary school students are key to improving the quality of education and technology interaction. Learning should utilize digital media to develop students' digital literacy. The implementation of digital literacy in primary

schools is important for technological advancement and information utilization (Naila et al., 2021). Students' literacy skills are still in poor condition, so they need to be improved. The low literacy culture is an indicator of students' weak literacy skills.

2. Factors contributing to low literacy skills among primary school students

The low reading and writing literacy of students in primary schools is due to several factors. Lack of interest in reading due to uninteresting reading sources, inadequate reading corners, lack of literacy training, and parental attention are elements of reduced literacy activities for primary school students. In addition, students' low speaking literacy is a lack of confidence in conveying ideas. Lack of interest in reading is a factor in the low literacy culture (Hijjayati et al., 2022). Students who are not good at conveying and writing ideas because of their lack of vocabulary.

Ineffective learning models cause students difficulty understanding the material (Nirmala, 2022). Using less effective models and less suitable for student characteristics is a factor in students having difficulty understanding and mastering the teacher's concepts. Lack of practice makes students unable to re-explain the material that has been learned. The low level of critical thinking is the cause of students' low ability to solve numerical problems. Critical thinking skills are relatively weak due to students' low language and reasoning skills. (Hayati & Setiawan, 2022). Critical thinking involves the ability to analyze, evaluate, and interpret information wisely, and this often requires a strong understanding of language and the ability to think logically. Limited learning resources and inappropriate reading books affect students' low literacy in the digital era. (Suparya et al., 2022).

3. The Implications of Low Literacy Skills of Digital-Age Primary School Students

The implications of low student literacy in various aspects of student life, especially in Indonesia's quality of basic education. Weak reading literacy has implications for students' learning abilities and problem-solving skills, access to information, and the overall quality of education (Hayati & Setiawan, 2022). In addition to this, low literacy can hinder the effective communication of ideas, thoughts, and ideas both orally and in writing and interfere with the development of students' cognitive and psychomotor aspects. Weak listening and science literacy have implications for the difficulty of capturing important messages in the learning process and cause indifference to the surrounding environment. A poor literacy culture impacts student activities that do not support literacy improvement.

Literacy is fundamental in understanding various aspects of student life, including understanding learning resources and studies delivered by teachers. So, low student literacy can hinder the learning process, including problem-solving. Literacy is not only the ability to read but also the ability to analyze, synthesize, and

solve problems. Students with weak literacy can have difficulty in solving complex problems in their lives.

CONCLUSION

The literacy skills of primary school students in Indonesia are factually found to be very low in this digital era. Primary school literacy skills in Indonesia are still low in the digital era, as seen from the difficulty in understanding simple texts, organizing ideas in writing, and understanding the material explained by the teacher. Low literacy covers aspects of speaking, writing, listening, speaking, science, maths, and digital due to a less supportive family environment, lack of technology utilization in learning, ineffective learning models, and limited digital access and training. The low literacy skills of primary school students in the digital era have implications for the reduced ability to solve problems, access information, and convey ideas and ideas effectively both orally and in writing, and digital utilization in learning. Strategies to overcome these challenges include the use of e-books, project-based learning, educational podcasts, *storytelling, educational games,* and technology training through online platforms.

Several effective strategies need to be implemented to improve the literacy skills of primary school students in Indonesia in the digital era. *Firstly*, the use of e-books and educational podcasts can help students access various learning materials more easily and interestingly and stimulate students' literacy interests. *Secondly*, the use of project-based learning models and *storytelling* can improve students' critical thinking skills and creativity, as well as organizing ideas well. *Thirdly*, the optimal integration of educational games and technology training in the learning process can overcome access limitations. The implementation of this strategy is expected to improve student's literacy skills as a whole.

The literacy skills of primary school students in Indonesia are still very low in the digital era. Future research could focus on identifying less supportive family environment factors as one of the causes of low literacy. A more in-depth study of family-based interventions that can improve the literacy environment at home, including family literacy programs and parental prowess in the learning process. The lack of utilization of technology in learning is a major concern. Future researchers could test the effectiveness of various educational technologies such as *e-books,* educational *podcasts, and educational games with more rigorous experimental models and larger samples to obtain more generalizable* results. This study shows that ineffective learning models contribute to low literacy. The next step is to explore innovative learning models such as project-based learning and storytelling and measure their long-term impact on students' literacy skills. Thus, future studies can be expected to provide more comprehensive and sustainable solutions to improve literacy among primary school students in Indonesia.

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