

A PRELIMINARY STUDY OF THE READABILITY OF INDONESIAN LANGUAGE TEXTBOOKS FOR FIRST GRADERS: A QUANTITATIVE ANALYSIS OF VOCABULARY DISTRIBUTION AND COMPLEXITY

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Abstract: This study aims to analyse the vocabulary distribution and readability of the ten Buku Sekolah Elektronik (BSE) Bahasa Indonesia for first-grade students. The research objectives are to assess the alignment of the textbooks with the cognitive and linguistic development of early learners, focusing on the total number of tokens (words), types (unique words), Type-Token Ratio (TTR), and word complexity. The problem addressed in this study is the potential misalignment between the complexity of language and the words frequency in BSE textbooks and the reading abilities of first-grade students, which may hinder effective literacy development. The study reveals that the total tokens across the textbooks range from 783 (Book 2) to 1562 (Book 7), while the total types vary from 2856 (Book 2) to 9525 (Book 1). The percentage of complex tokens fluctuates between 0.31 (Book 2) and 0.51 (Book 7), and the percentage of complex types ranges from 0.46 (Book 5) to 0.54 (Book 6). The TTR values demonstrate significant variation, from 3.65 (Book 2) to 7.48 (Book 10), indicating the diversity in vocabulary used. Findings suggest that although some textbooks offer a rich variety of vocabulary, they may contain a high proportion of complex words, potentially making them unsuitable for first graders. For instance, Book 10 exhibits the highest TTR but includes more complex words, which might challenge early learners. In contrast, Book 2, with a lower TTR, contains simpler words, making it more suitable for young learners. The study underscores the importance of minimizing vocabulary complexity to facilitate effective literacy development for early readers such as first grade elementary students. Future research should investigate the use of multimedia-based textbooks and interactive learning methods to enhance the literacy experiences of early learners.

Keywords: Readability test, text complexity, gunning-fox index

INTRODUCTION

Background

Literacy is a fundamental skill that must be acquired from an early age as it forms the primary foundation for a child's academic and social development. Strong literacy skills not only contribute to enhancing reading and writing competencies but also play a crucial role in the cognitive, emotional, and social development of children (Mardiyah et al., 2020). Literacy is a cornerstone of primary education, serving as the foundation for future academic success and lifelong learning. The research trends in literacy as a foundation for primary education in Indonesia highlight a fluctuating number of publications from 2019 to 2023, with a peak in 2021 and 2022 (Yudianto et al., 2024). Literacy in enhancing students' learning, supported by various teaching models and digital literacy initiatives, underscoring the need for collaborative efforts in developing literacy across elementary education.

In the current digital era, children are exposed to various forms of information media from an early age, which require more complex literacy skills. However, the results of the PIRLS survey indicate that Indonesian students' reading abilities are still relatively low (Yulianti & Sidik, 2024). Elementary school children in Indonesia exhibit low reading abilities, particularly in reading comprehension skills (Kartikasari & Nuryasana, 2022; Ramadhan et al., 2023; Suci Lestari, 2021; Tahmidaten & Krismanto, 2020). Literacy education is not only the responsibility of schools but also requires support from the family and the child's social environment to create a holistic learning experience (Parapat et al., 2023). Therefore, research on the readability of texts in the *Buku Sekolah Elektronik (BSE) Bahasa Indonesia* for first-grade students is a crucial first step in assessing the extent to which the texts used align with the early literacy abilities of children, thereby supporting more effective learning.

Children aged 4 to 6 years are at a stage of rapid language development, where they begin to enrich their vocabulary, understand more complex sentence structures, and develop more effective communication skills. At this stage, environmental stimulation plays a crucial role in supporting their language development, whether through social interactions, parenting styles, or the teaching methods used at school (Pradita et al., 2024). The parenting style applied by parents is a key factor in children's language acquisition, where rich verbal interactions and appropriate stimulation can enhance speaking abilities and word comprehension in early childhood (Brantasari, 2022). Additionally, research shows that storytelling methods can be an effective tool in enhancing children's language development, particularly in improving speaking skills and enriching their vocabulary (Hartati et al., 2021). Other studies also reveal that social interaction with peers and the surrounding environment significantly contributes to the development of children's language skills, as it allows them to use language in various contexts and situations (Agustus et al., 2024). Furthermore, research on language development in school environments emphasizes the importance of textbooks and reading materials that align with children's developmental stages, as exposure to appropriate vocabulary can help accelerate their early literacy process (Ita et al., 2020). Therefore, understanding the language development of children aged 4 to 6 years is crucial to ensure that the teaching materials and learning methods used effectively support the optimal language acquisition process.

The readability of teaching materials is a crucial factor in supporting the early literacy process of students, particularly during the initial stages of reading instruction. The *Buku Sekolah Elektronik (BSE) Bahasa Indonesia* is designed as the primary learning resource for first-grade students, with the goal of helping them gradually recognize and understand vocabulary. However, many first-grade students still struggle to comprehend simple texts, indicating a potential mismatch between the readability level of the BSE and the actual abilities of children in understanding written language (Fariska & Pratikno, 2024). The reading difficulties experienced by students are generally related to obstacles in recognizing letters, forming syllables, and understanding the association between written symbols and sounds (Ariyani et al., 2023). Furthermore, research shows that many early-grade students still struggle with spelling words and understanding simple sentence structures, which affects their reading fluency (Hartati et al., 2021). Studies on the readability of Indonesian language teaching materials using the Fry Graph method also reveal that most texts in the BSE are more appropriate for second, third, and fourth-grade students. This results in a mismatch between the complexity of the texts and the early reading abilities of first-grade students (Nugrahani et al., 2024; Sumadyo et al., 2019). In addition to internal factors related to the students, this mismatch is also caused by the lack of adaptation of teaching materials to the cognitive development of children, which could potentially hinder the achievement of basic literacy goals

at the elementary school level. Therefore, a more in-depth analysis of word frequency in the BSE Bahasa Indonesia for first-grade students is needed to assess the readability level of the texts and ensure their alignment with the students' early literacy development.

The selection of vocabulary that aligns with children's language development is crucial to ensure the effectiveness of early reading instruction. Children aged 4 to 6 years are at a critical stage of cognitive development, where they begin to recognize and understand basic words that will form the foundation of their future literacy skills. Therefore, the vocabulary used in textbooks should be tailored to the child's cognitive ability, avoiding excessive complexity or repetition. Research shows that developing a rich vocabulary during the early years has a significant impact on children's communication skills, including listening, speaking, reading, and writing (*The Importance of Vocabulary Building in the Early Years - Avery Hill Education*, n.d.). A broad vocabulary also contributes to reading comprehension skills, which are a key indicator of a child's academic development (MICHA, 2017). In the context of early childhood education, it is important for educators to select vocabulary that matches the child's cognitive development stage, so they can easily recognize and remember words (*Developing Vocabulary in Early Years Education _ EEF*, n.d.). Additionally, the selection of appropriate vocabulary can make the learning process more enjoyable and effective, while also preventing confusion or boredom caused by texts that are too complex or too simplistic (*The Importance of Vocabulary _ JCFS*, n.d.). Therefore, the selection of appropriate vocabulary in textbooks plays a crucial role in the success of early childhood reading instruction.

Token frequency refers to the number of times a specific word occurs in language use, influencing its accessibility and resistance to change. Type frequency, on the other hand, relates to the number of different forms (types) a word can take, affecting its productivity in new contexts. "Tokens" refer to the total number of words produced in a speech sample, while "types" denote the number of unique words. The type/token ratio (TTR) measures lexical diversity, indicating how varied a child's vocabulary is. (Kapatsinski, 2023; Scherer & Souza, 2011) . Word complexity can be linked to morphological family size, where larger families enhance recognition. High token frequency can lead to chunking, while also making words more prone to articulatory streamlining. In linguistics, "token" refers to the actual instances of words used in speech or writing, while "type" denotes the unique forms of words regardless of their frequency (Berg et al., 2022). The study highlights that type frequency influences word length, with longer words being less frequent as tokens. Word complexity can be assessed through these frequencies, as longer words often exhibit a higher type frequency, indicating a more intricate lexicon. This interplay shapes the distribution of word lengths across different languages. Word complexity arises from the balance between the number of tokens and types, impacting language model adaptability (Yang, 2024). The evolution from word-level to subword-level tokenization aims to reduce this complexity, particularly in handling multiword expressions (MWEs) and non-Latin languages, ultimately improving the performance of language models.

Until now, there has been limited research that quantitatively analyzes the distribution of vocabulary in the Buku Sekolah Elektronik (BSE) Bahasa Indonesia, particularly in terms of tokens (total word count), types (unique words), and word complexity. Most research related to BSE has focused more on qualitative aspects, such as the analysis of the feasibility and relevance of teaching materials (Pratiwi, 2020), or the use of descriptive approaches to assess the usefulness of teaching materials at the elementary education level. (Dhenada Aprillya Saputri, 2024). Meanwhile, previous articles (Mulyati, 2017) have mostly focused on word types

and fields of meaning in students' vocabulary acquisition, but have not delved deeply into the distribution of word frequency in teaching texts, which can affect readability (Mulyati, 2017). Another study by Purnanto (Purnanto et al., 2020) Regarding complexity in textbook questions, it focuses more on analyzing questions based on the SOLO taxonomy without analyzing word frequency and token or type aspects in the context of BSE (Purnanto et al., 2020) . Therefore, research focusing on the quantitative analysis of word frequency and text complexity in the Buku Sekolah Elektronik (BSE) Bahasa Indonesia for first-grade students is essential to fill the gap in data-driven text literacy studies, ensuring readability that aligns with the early literacy development of children.

The selection of vocabulary in teaching materials for children aged 4 to 6 years must be aligned with their language development level to effectively support the learning process. However, many teaching materials still use vocabulary that is either too complex or lacks variation, potentially hindering children's ability to read and comprehend texts. Children at this age are in a stage of rapid language development, so exposure to vocabulary that is appropriate and suitable for their abilities is crucial to support text comprehension. Study by Rahma (Rahma Anggraeni et al., 2022) It shows that selecting vocabulary appropriate to the child's development plays a key role in vocabulary acquisition at the Early Childhood Education (ECE) level. Furthermore, play activities that involve suitable vocabulary can enhance children's language abilities, highlighting the importance of vocabulary diversity in a fun and engaging learning environment (Kosakata et al., 2022). The use of picture books with appropriate vocabulary can help children understand the meaning of words and integrate them into everyday conversations (Ulandari et al., 2023). The macro role-playing method can enhance vocabulary acquisition in children aged 4 to 5 years (Lidyasari, 2017; Muhria et al., 2022). An approach that aligns with children's cognitive development is crucial to accelerating their vocabulary comprehension. Therefore, it is important for textbooks to use vocabulary that is not only suitable for the child's language abilities but also varied and relevant to their developmental stage, to ensure effective learning and support optimal language development.

Linguistic features such as sentence length, word complexity, and vocabulary are critical in determining the readability of a text. A study analyzing the readability of Javanese language textbooks found that the texts were too complex for fourth-grade students, with a readability score of 9.075, making them difficult to understand (Maruti et al., 2024). Text complexity is another important criterion. A study using the Flesch Reading Ease Formula to analyze English textbooks for Grade 11 students found that the texts were standard in terms of readability but were perceived as difficult by students (Achmad & Arifin, 2017). Cognitive demands refer to the mental effort required to process and understand the text. A study on the readability of English textbooks for high school students found that the texts were categorized as "standard" or "very easy" based on the Miyazaki EFL Readability Index and McAlpine EFLAW formula, indicating that they were suitable for the target students (Azima et al., 2022). Cultural and contextual relevance are also important criteria. A study on the use of Betawi ondel-ondel in elementary school textbooks found that integrating local cultural elements positively contributed to students' understanding and appreciation of their cultural heritage (Ummah et al., 2024).

The Indonesian government has provided the Buku Sekolah Elektronik (BSE) Bahasa Indonesia as the primary teaching material for first-grade students, with the aim of helping students gradually recognize and understand vocabulary. The BSE plays a strategic role in enhancing students' basic literacy, as the materials are organized according to pedagogical

principles that align with the child's cognitive development level (Rosita & Sulistyani, 2022a). In the context of early learning, the readability of texts in the BSE becomes a crucial factor that determines the effectiveness of learning, particularly in building a strong vocabulary foundation for students (Gumono, 2016). Research indicates that the readability level of teaching materials significantly affects students' comprehension and reading interest, making it essential to conduct a thorough evaluation of the texts used in the BSE (Fauzi et al., 2023). One commonly used method for assessing the readability of teaching materials is the Fry Graph formula, which allows for determining the text's alignment with its target audience (Nugrahani et al., 2024). However, various studies suggest that many textbooks still have readability levels that do not align with students' abilities, potentially hindering their comprehension of the text (Sri Arini et al., 2019). Therefore, further research is needed on the word frequency analysis in the BSE Bahasa Indonesia for first-grade students to assess the readability level of the texts and their alignment with their early literacy abilities.

Research Gap

Most research related to the Buku Sekolah Elektronik (BSE) Bahasa Indonesia has primarily focused on content analysis and teaching methods, without exploring in depth the extent to which the vocabulary composition in the textbooks meets early literacy standards. Previous studies have mostly examined students' vocabulary acquisition by analyzing word types and forms within the context of teaching; however, they did not quantitatively address vocabulary distribution or word frequency within the textbooks (Mulyati, 2017), which is crucial for assessing the readability of the book for first-grade students. Other studies have analyzed the readability of BSE for junior high school students using the Fry Graph, but did not incorporate word frequency (tokens) or unique word distribution (types) in their analysis, even though this is essential for evaluating the alignment of the text with the cognitive development levels of early learners (Gumono, 2016). Similarly, research on the readability of textbooks for Madrasah Ibtidaiyah (Rosita & Sulistyani, 2022) focused more on the overall feasibility of the text but did not include a quantitative analysis of word distribution and word complexity, which is relevant for evaluating the readability of textbooks for first-grade students (Rosita & Sulistyani, 2022). Therefore, while these studies provide valuable insights into readability and the quality of teaching materials, none have explicitly analyzed word frequency and distribution in the context of BSE Bahasa Indonesia for first-grade students. As a result, further research is needed to fill this gap by conducting a quantitative analysis of vocabulary composition in the BSE to ensure that the textbooks align with children's early literacy abilities and can support effective literacy development in the early stages of education.

The existing gap in studies on vocabulary distribution in the Buku Sekolah Elektronik (BSE) Bahasa Indonesia for first-grade students highlights the need for research that provides concrete data on the vocabulary structure within this teaching material. While many studies assess the quality and readability of teaching materials in general, none have specifically conducted a quantitative analysis of the word proportions used in the BSE. This is crucial to determine whether the BSE has been compiled with a vocabulary proportion that aligns with the language abilities of first-grade students, thereby supporting their literacy development effectively. Therefore, research analysing word frequency, both in terms of tokens (total word count) and types (unique words), as well as word complexity in the BSE, is essential. With concrete data on this vocabulary structure, we can assess whether the textbook meets early literacy standards, particularly in supporting the introduction of basic vocabulary and comprehension of texts that align with children's cognitive stages. Thus, this research is highly

relevant to fill the gap in textbook studies, offering a more comprehensive, data-driven evaluation of vocabulary use in the BSE Bahasa Indonesia.

Most research related to textbooks has primarily focused on content analysis and teaching methods. Unfortunately, quantitative studies on the distribution of tokens (total word count), types (unique words), and word complexity in the Buku Sekolah Elektronik (BSE) Bahasa Indonesia for first-grade students are still very limited. This has resulted in a lack of concrete data showing whether the BSE meets early literacy needs. The coherence between literacy content in the curriculum and the characteristics of elementary school-age children, which can influence students' comprehension of teaching materials (Nugrahani et al., 2024), makes it essential to ensure that the BSE is compiled with language complexity that aligns with children's early literacy abilities to effectively support the learning process.

Purpose of the Study

The aim of this study is to analyze the word frequency in the BSE Bahasa Indonesia for first-grade students by measuring the number of tokens, types, Type-Token Ratio (TTR), and word complexity to provide recommendations for the development of teaching materials better suited to the literacy needs of young children.

METHOD

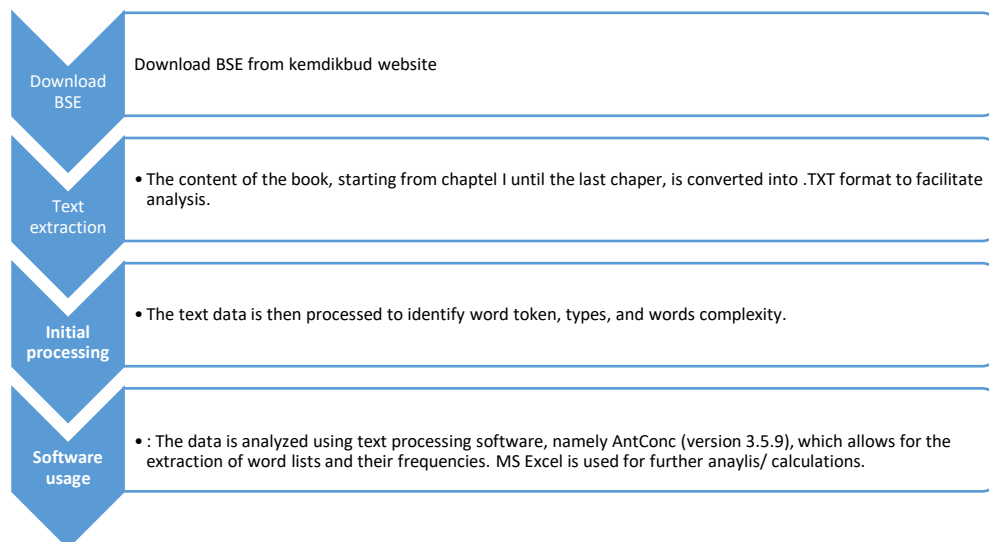
Research Design

This study uses a quantitative approach with corpus linguistic analysis methods to measure the vocabulary distribution in the Buku Sekolah Elektronik (BSE) Bahasa Indonesia for first-grade students. This approach allows for an objective analysis of the patterns of word usage in the text, which can then be used to assess the level of language complexity in the teaching material.

The data source for this research is the ten Buku Sekolah Elektronik (BSE) Bahasa Indonesia for first-grade students, published by the Ministry of Education and Culture (Kemdikbud). This book was selected as the research object because it is widely used in primary education in Indonesia. The data analysis comes from the contents of the book, which have been converted into a digital format.

Data Collection

The data gathering as showed



The next step is the calculation of Tokens and Types, where Tokens represent the total number of words appearing in the text, and Types represent the number of unique words in the text. After determining the number of tokens and types, the Type-Token Ratio (TTR) is calculated. TTR is the ratio between the number of types and tokens and is used to measure the vocabulary diversity in the text.

After calculating the TTR, word complexity analysis can be performed by measuring word length based on the number of syllables. In this study, word complexity is defined as words consisting of three syllables or more (Nugraha, 2024). Another method of analysis is determining the number of complex words, which are words consisting of three syllables or more. The analyzed words are categorized into easy and difficult categories. Afterward, data cleaning is performed by removing irrelevant characters, such as single letters or non-word elements that have no meaning in linguistic analysis. The results of the analysis are displayed in a table format to show the vocabulary distribution and its complexity level.

DISCUSSION AND FINDINGS

The analysis of the Buku Sekolah Elektronik (BSE) Bahasa Indonesia for first-grade students shows that the total number of words (tokens) in the text reaches 62,945, while the number of unique words (types) is 4,820. These figures reflect the level of vocabulary diversity used in the teaching material. When compared to early childhood literacy standards, the high token count indicates that students are exposed to enough repeated words, while the number of types provides an overview of the extent of vocabulary variation introduced to the students. This diversity is essential in building the foundation of reading and text comprehension skills for children in the early stages of learning.

The calculation of the Type-Token Ratio (TTR) in the BSE shows a value that reflects the level of vocabulary variation. TTR is calculated by dividing the number of types by the number of tokens, which in this study shows that there is a balance between repeated words and new vocabulary introduced. The higher the TTR value, the greater the vocabulary variation used in the text.

Type-Token Ratio (TTR) is calculated as the ratio between unique words (types) and total words (tokens). The higher the TTR, the greater the vocabulary variation, which is important for the students' language development. Books with a higher TTR tend to offer greater vocabulary variation, but if the TTR is too high, it may make the book more difficult to understand, particularly for first-grade students.

- For example, Book 9 has a TTR of 0.52, while Book 2 has a TTR of 0.31. This shows that Book 9 offers greater vocabulary variation.

	Types	Tokens	Syllables	Syllables x Tokens	Complex Word Tokens	Complex Word Types	Complex Word Tokens %	Complex Word Types %
1	1.540	9.525	4.092	22.786	3.739	815	0,39	0,53
2	783	2.856	2.009	6.455	889	372	0,31	0,48
3	1.033	4.432	2.775	10.496	1.582	557	0,36	0,54
4	1.024	4.302	2.746	10.686	1.793	535	0,42	0,52
5	1.484	9.190	3.780	21.346	3.022	678	0,33	0,46
6	1.522	8.104	4.170	19.391	3.130	824	0,39	0,54
7	1.562	4.267	4.158	11.896	2.164	821	0,51	0,53
8	905	4.387	2.396	10.520	1.634	464	0,37	0,51
9	916	3.161	2.424	7.709	1.278	473	0,40	0,52
10	1.039	7.775	2.626,0	17.351,0	2.430	494	0,31	0,48
						MIN	0,31	0,46
						MAX	0,51	0,54
						MEAN	0,39	0,51

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- 1 1_bhs indo_kls 1_halimah_12 feb 2025
- 2 2_bhs indo_kls 1_hapsari_12 feb 2025
- 3 3_bhs indo_kls 1_iskandar_12 feb 2025
- 4 4_bhs indo_kls 1_ismail_12 feb 2025
- 5 5_bhs indo_kls 1_jaruki_12 feb 2025
- 6 6_bhs indo_kls 1_mahtud_12 feb 2025
- 7 7_bhs indo_kls 1_suyatno_12 feb 2025
- 8 8_bhs indo_kls 1_umri_12 feb 2025
- 9 9_bhs indo_kls 1_yeti_12 feb 2025
- 10 10_BSE bhs indo_kurmer_kls 1_20 feb a

The word complexity analysis reveals that most words in the BSE consist of simple words (two syllables or fewer), while the proportion of complex words (three syllables or more) remains smaller. These complex words often originate from words with affixes or academic terms introduced to students. The dominance of simple words indicates that the textbooks have been designed with consideration for the early understanding of young children. However, the controlled use of complex words is also important to help students gradually recognize more complex language structures.

The complexity of the text is assessed based on the proportion of complex words (those with more syllables). Books with a higher proportion of complex words are considered more difficult to read.

For example:

- Book 7 has 0.51 for the percentage of complex word types and 0.39 for the percentage of complex word tokens, indicating that its proportion of complex words is relatively high compared to simpler words.

Based on the Type-Token Ratio (TTR), here is the ranking of books from the most complex to the simplest:

- Book 9 (TTR = 0.52) – Highest vocabulary variation, likely the most complex.

2. Book 3 (TTR = 0.54) – High vocabulary variation.
3. Book 8 (TTR = 0.51)
4. Book 7 (TTR = 0.53)
5. Book 10 (TTR = 0.48)
6. Book 4 (TTR = 0.52)
7. Book 6 (TTR = 0.54)
8. Book 1 (TTR = 0.39) – Lower vocabulary variation, simpler.
9. Book 5 (TTR = 0.33) – The simplest, likely the most suitable for first-grade students.
10. Book 2 (TTR = 0.31) – Lowest TTR, simplest language.

The results of the vocabulary distribution and word complexity analysis, when compared with early childhood literacy standards, show that the BSE Bahasa Indonesia for first-grade students has been designed with a relatively appropriate readability level. Most of the words used in the BSE align with vocabulary commonly understood by early elementary school children. However, there are parts with the use of complex words that may require additional guidance from teachers or parents. Therefore, although the BSE meets readability standards, its use in learning still needs to be supported by appropriate teaching strategies to ensure that students can understand the material well.

When compared to early childhood literacy standards, books with a TTR below 0.40 and a lower percentage of complex words (below 40%) tend to be more suitable for early childhood education. Books with a higher TTR and more complex words may not align with the literacy level of first-grade students.

The results of this study have important implications for teaching Bahasa Indonesia in primary schools. By understanding vocabulary distribution, word variation, and the readability level of the BSE, teachers can be more selective in choosing teaching materials that align with students' comprehension levels. Additionally, this analysis can assist in the development of more effective teaching strategies, such as using a gradual approach to introduce complex words and increasing the variation of vocabulary taught. Thus, the results of this study can be used as a reference in designing curricula and teaching materials that better meet the developmental needs of early childhood language learners.

CONCLUSION

This research is sponsored by LPPM Pelita Harapan University, Indonesia, and we found that the vocabulary distribution in the Buku Sekolah Elektronik (BSE) Bahasa Indonesia for first-grade students shows a diverse range, reflecting the students' language development levels. Based on the Type-Token Ratio (TTR) analysis, some books feature high vocabulary variation, which can support language enrichment but may also present a challenge for first-grade students. Books with a lower TTR and a smaller proportion of complex words tend to be more suitable for the literacy level of first-grade students. Therefore, books with a TTR below 0.40 and fewer complex words are more appropriate to support Bahasa Indonesia learning in first-grade classrooms.

This study focuses solely on vocabulary analysis within the BSE text, without considering the visual or interactive aspects of the teaching materials. Elements such as images, diagrams, and other interactive components that may help reinforce student understanding were not analyzed in this study. This is a limitation, as visual and interactive engagement often

plays a significant role in early childhood learning, particularly in enhancing readability and understanding of context.

Future studies could expand the analysis by investigating the complexity of the sentences used in the textbooks. It is needed to calculate the readability of the textbooks using various readability formula such as Flesch-Kincaid or Gunning Fog Index to find out whether the books are suitable for the intended grade level.

REFERENCES

- Achmad, A., & Arifin, S. (2017). *The Readability Level of Reading Texts in the English Textbook Entitled "Bahasa Inggris SMAMAMAK" For Grade XI Semester 1 Published by the Ministry of Education and Culture of Indonesia*" (Vol. 2, Issue 8.5.2017).
- Agustus, N., Jl, A., Andi, P., Nst, H., Stain, K., Lombang, P., Panyabungan, K., Natal, K. M., & Utara, S. (2024). *Peran Interaksi Sosial Terhadap Pengembangan Bahasa Anak Usia Dini Metode penelitian yang digunakan dalam studi ini adalah penelitian kualitatif , meningkatkan perkembangan bahasa pada anak usia dini . Dalam melakukan penelitian , . 3(3), 39–45.*
- Ariyani, D. P., Hilyana, F. S., & Fardani, M. A. (2023). Analisis Kesulitan Membaca Pada Siswa Kelas 1 Sd 2 Kaliwungu. *Jurnal Muara Pendidikan, 8(2), 363–370.* <https://doi.org/10.52060/mp.v8i2.1337>
- Azima, F., Ping, M. T., & A.K. Amarullah. (2022). Are these texts readable? An Analysis on the Readability Level of English Textbooks for Indonesian High Schools. *Borneo Educational Journal (Borju), 5(1), 27–36.* <https://doi.org/10.24903/bej.v5i1.1095>
- Berg, T., Zörnig, P., & Lehr, C. (2022). The effects of type and token frequency on word length: A cross-linguistic study. *Glottology, 13(2), 173–209.* <https://doi.org/10.1515/glot-2022-2007>
- Brantasari, M. (2022). Pola Asuh Orang Tua terhadap Perkembangan Bahasa Anak Usia Dini. *Murhum : Jurnal Pendidikan Anak Usia Dini, 3(2), 42–51.* <https://doi.org/10.37985/murhum.v3i2.119>
- Developing vocabulary in early years education _ EEF.* (n.d.).
- Dhenada Aprillya Saputri, W. S. (2024). Analisis keterampilan membaca pemahaman siswa kelas iii sekolah dasar dalam konteks implementasi program literasi sekolah. *Jpgsg, 12, 29–39.*
- Fariska, F. D., & Pratikno, A. S. (2024). *Analisis Kesulitan Membaca Permulaan pada Peserta Didik Kelas I A UPTD SD Negeri Kamal 2 Kabupaten Bangkalan Guru Tua : Jurnal Pendidikan dan Pembelajaran Analisis Kesulitan Membaca Permulaan pada Peserta Didik Kelas I A UPTD SD Negeri Kamal 2 Kabupaten B. November.* <https://doi.org/10.31970/gurutua.v7i2.202>
- Fauzi, A., Nasrullah, & Zakiah, S. (2023). Keterbacaan Teks Buku Ajar Berpengaruh. *Rausyan Fikr: Jurnal Pemikiran & Pencerahan, 19(1), 91–98.*
- Gumono, G. (2016). Analisis Tingkat Keterbacaan Buku Siswa Bahasa Indonesia Kelas Vii Berbasis Kurikulum 2013. *Diksa : Pendidikan Bahasa Dan Sastra Indonesia, 2(2), 132–141.* <https://doi.org/10.33369/diksa.v2i2.3300>
- Hartati, S., Damayanti, E., Rusdi T, M., & Patiung, D. (2021). Peran Metode Bercerita terhadap Perkembangan Bahasa Anak Usia Dini. *Jurnal PG-PAUD Trunojoyo : Jurnal Pendidikan Dan*

- Pembelajaran Anak Usia Dini, 8(2), 74–86.
<https://doi.org/10.21107/pgpaustrunojoyo.v8i2.10513>
- Ita, E., Wewe, M., & Go.o, E. (2020). Analisis Perkembangan Kemampuan Bahasa Anak Kelompok A Taman Kanak-Kanak. *Al-Athfaal: Jurnal Ilmiah Pendidikan Anak Usia Dini*, 3(2), 174–186. <https://doi.org/10.24042/ajipaud.v3i2.7317>
- Kapatsinski, V. (2023). Understanding the roles of type and token frequency in usage-based linguistics. In *The Handbook of Usage-Based Linguistics* (pp. 91–106). <https://doi.org/10.1002/9781119839859.ch5>
- Kartikasari, E., & Nuryasana, E. (2022). School literacy movement program in elementary school, Indonesia: Literature review. *Journal of Education and Learning (EduLearn)*, 16(3), 336–341. <https://doi.org/10.11591/edulearn.v16i3.20383>
- Kosakata, P., Aplikasi, M., Bagi, L., & Usia, A. (2022). *Siti Hanifah, 2022 PEMBELAJARAN KOSAKATA MELALUI APLIKASI LEARNINGAPPS BAGI ANAK USIA DINI Universitas Pendidikan Indonesia | repository.upi.edu | perpustakaan.upi.edu.*
- Lidyasari, A. puspa. (2017). *Upaya Meningkatkan Penguasaan Kosa Kata Anak Makro Di Tk Kristen 1 Satya Wacana Salatiga.*
- Mardiyah, S., Siahaan, H., & Budirahayu, T. (2020). Pengembangan Literasi Dini melalui Kerjasama Keluarga dan Sekolah di Taman Anak Sanggar Anak Alam Yogyakarta. *Jurnal Obsesi : Jurnal Pendidikan Anak Usia Dini*, 4(2), 892. <https://doi.org/10.31004/obsesi.v4i2.476>
- Maruti, E. S., Cahyono, B. E. H., Kurniawati, R. P., & Hanif, M. (2024). Do Javanese textbooks convey relevant material? Evidence of readability and value of learning outcomes. *Preventing School Failure*, 68(2), 133–138. <https://doi.org/10.1080/1045988X.2023.2181299>
- MICHA, R. (2017). 乳鼠心肌提取 HHS Public Access. *Physiology & Behavior*, 176(1), 100–106. <https://doi.org/10.1177/0022146515594631.Marriage>
- Muhria, L., Fitriati, W., Suwandi, S., & Wahyuni, S. (2022). Penguatan Literasi Digital Melalui Penerapan Model Blended Learning Dalam Pembelajaran Bahasa Inggris. *Prosiding Seminar Nasional Pascasarjana (PROSNAMPAS)*, 605–609. <http://pps.unnes.ac.id/prodi/prosiding-pascasarjana-unnes/>
- Mulyati, Y. (2017). Kosakata Siswa Sekolah Dasar Kelas Rendah (Kajian Jenis Kata, Bentuk Kata, Jenis Makna, Dan Medan Makna). *Bahasa Dan Seni: Jurnal Bahasa, Sastra, Seni Dan Pengajarannya*, 45(1), 099–107. <https://doi.org/10.17977/um015v45i12017p099>
- Nugraha, D. S. (2024). Some Notes on Indonesian Word Formation: A Study Based on the Derivational Morphology Approach. *South Asian Research Journal of Humanities and Social Sciences*. <https://doi.org/10.36346/sarjhss.2024.v06i01.004>
- Nugrahani, A. F., Saputri, D. S. D., Iffadah, A. D., Adiwijaya, S. N., & Andrian, F. (2024). Analisis Keterbacaan Bahan Ajar Bahasa Indonesia Pada Kelas I SD Berdasarkan Grafik Fry. *JEMARI (Jurnal Edukasi Madrasah Ibtidaiyah)*, 6(1), 46–51. <https://doi.org/10.30599/jemari.v6i1.3017>
- Parapat, I. K., Mardianto, M., & Nasution, M. I. P. (2023). Mengoptimalkan Pengenalan Literasi Pada Anak Sejak Usia Dini: Menumbuhkan Keterampilan Membaca dan Menulis. *Jurnal Raudhah*, 11(1), 38–49. <https://doi.org/10.30829/raudhah.v11i1.2818>

- Pradita, E. L., Kumala Dewi, A., Nasywa Tsuraya, N., & Fauziah, M. (2024). Peran Orang Tua dalam Pengembangan Bahasa Anak Usia Dini. *Indo-MathEdu Intellectuals Journal*, 5(1), 1238–1248. <https://doi.org/10.54373/imeij.v5i1.883>
- Pratiwi, C. P. (2020). Analisis Keterampilan Membaca Permulaan Siswa Sekolah Dasar: Studi Kasus pada Siswa Kelas 2 Sekolah Dasar. *Jurnal Pendidikan Edutama*, 7(1), 1. <https://doi.org/10.30734/jpe.v7i1.558>
- Purnanto, A. W., Triana, P. M., Rahmawati, L. E., & Gajewski, D. M. (2020). Kompleksitas dan Determinasi Luaran Pembelajaran pada Buku Teks Kurikulum 2013 Kelas 4 Sekolah Dasar Tema 2. *Jurnal Inspirasi Pendidikan*, 10(1), 41–50. <https://doi.org/10.21067/jip.v10i1.4137>
- Rahma Anggraeni, A., Ajizah Khasanah, N., Nikmah Febias, H., Sulistiyono, R., Ulfa Martha, N., & Jenderal Soedirman, U. (2022). Keterbacaan Materi Cerita Rakyat Pada Buku Teks Bahasa Rahma Anggraeni, A., Ajizah Khasanah, N., Nikmah Febias, H., Sulistiyono, R., Ulfa Martha, N., & Jenderal Soedirman, U. (2022). Keterbacaan Materi Cerita Rakyat Pada Buku Teks Bahasa Indonesia Kelas X. In *Jurnal Pendidikan* (Vol. 13, Issue 2, pp. 137–149). <https://jp.ejournal.unri.ac.id/index.php/JP/index>
- Ramadhan, A., Nandini, E. Z., Febriyanti, I. N., & Putra, P. (2023). Membangun Budaya Literasi Melalui Peningkatan Minat Baca Pada Masyarakat Desa Pantai Sederhana. *An-Nizam*, 2(1), 205–2011. <https://doi.org/10.33558/an-nizam.v2i1.6715>
- Rosita, I., & Sulistyani, A. (2022a). Analisis Tingkat Keterbacaan Buku Teks Bahasa Indonesia Kelas V Madrasah Ibtidaiyah Al-Zaytun. *SALAM: Jurnal Sosial Dan Budaya Syar-I*, 9(1), 177–200. <https://doi.org/10.15408/sjsbs.v9i1.24549>
- Rosita, I., & Sulistyani, A. (2022b). Analisis Tingkat Keterbacaan Buku Teks Bahasa Indonesia Kelas V Madrasah Ibtidaiyah Al-Zaytun. *SALAM: Jurnal Sosial Dan Budaya Syar-I*, 9(1), 177–200. <https://doi.org/10.15408/sjsbs.v9i1.24549>
- Scherer, S., & Souza, A. P. R. de. (2011). Types e tokens na aquisição típica de linguagem por sujeitos de 18 a 32 meses falantes do português brasileiro. *Revista CEFAC*, 13(5), 838–846. <https://doi.org/10.1590/s1516-18462011005000058>
- Sri Arini, N. W., Putu Widja, I. B., & Yasa Negara, I. K. R. (2019). Analisis Frekuensi Kata untuk Mengekstrak Kata Kunci dari Artikel Ilmiah Berbahasa Indonesia. *Eksplora Informatika*, 8(2), 80–84. <https://doi.org/10.30864/eksplora.v8i2.162>
- Suci Lestari. (2021). Pembelajaran Online Berbasis Proyek Pada Mata Pelajaran Bahasa Inggris Ditengah Pandemi Covid-19. *Ed-Humanistics : Jurnal Ilmu Pendidikan*, 6(2), 836–842. <https://doi.org/10.33752/ed-humanistics.v6i2.2087>
- Sumadyo, B., Setiawati, S., Sumarti, S., Hilalayah, H., Agustin, Y., & Nafilah, I. (2019). *The Readability of Elementary School Level Textbooks with Raygor Graphics in the Context of Indonesian Language Education*. <https://doi.org/10.4108/eai.21-12-2018.2282573>
- Tahmidaten, L., & Krismanto, W. (2020). Permasalahan Budaya Membaca di Indonesia (Studi Pustaka Tentang Problematika & Solusinya). *Scholaria: Jurnal Pendidikan Dan Kebudayaan*, 10(1), 22–33. <https://doi.org/10.24246/j.js.2020.v10.i1.p22-33>
- The Importance of Vocabulary _ JCFs*. (n.d.).
- The Importance of Vocabulary Building in the Early Years - Avery Hill Education*. (n.d.).

- Ulandari, S., Miranda, D., Studi, P., Guru, P., Anak, P., Dini, U., Tanjungpura, U., Info, A., Story, P., & Method, B. (2023). *Volume 12 Nomor 2 Tahun 2023 Halaman 390-402 PENGARUH METODE BUKU CERITA BERGAMBAR TERHADAP KEMAMPUAN KOSAKATA PADA ANAK USIA 5-6 TAHUN*. 12, 2715–2723. <https://doi.org/10.26418/jppk.v12i2.62207>
- Ummah, W., Mudrika, D., Fatmawati, A. W., & Gumala, Y. (2024). Cultural Literacy : Ondel-Ondel Betawi in Elementary School Textbooks. *Jurnal Basicedu*, 8(3), 2448–2456. <https://doi.org/10.31004/basicedu.v8i3.7899>
- Yang, J. (2024). Rethinking tokenization. *International Journal of Chinese Linguistics*, 11(1), 94–109. <https://doi.org/10.1075/ijchl.00023.yan>
- Yudianto, A., Mustadi, A., & Mokhsein, S. E. B. (2024). Research Trends in the Indonesian Elementary School Literacy Movement: From Number of Publications, Research Approaches, to Findings. *KEMBARA Journal of Scientific Language Literature and Teaching*, 10(1), 115–131. <https://doi.org/10.22219/kembara.v10i1.30240>
- Yulianti, Y., & Sidik, U. (2024). Strategi Pembelajaran Literasi Emergen pada PAUD. *Jurnal Obsesi : Jurnal Pendidikan Anak Usia Dini*, 8(2), 235–244. <https://doi.org/10.31004/obsesi.v8i2.5388>